FINANCE IN AFRICA

Navigating the financial landscape in turbulent times

European Investment Bank
The EU bank

FINANCE IN AFRICA

Navigating the financial landscape in turbulent times

European Investment Bank

The EU bank

Finance in Africa: Navigating the financial landscape in turbulent times

This is a publication of the EIB Economics Department.

About the report
The Finance in Africa report is a product of the EIB Economics Department providing an analysis of recent development in the African banking sectors and specific structural topics of relevance. It combines in house research with contribution from leading market experts from commercial banks operating in the region, IFIs and other institutions. This report was prepared on the basis of data available in September 2022.

About the EIB Economics Department
The mission of the EIB Economics Department is to provide economic analyses and studies to support the Bank in its operations and in the definition of its positioning, strategy and policy. The Department, a team of 45 economists, is headed by Debora Revoltella, Director of Economics.

www.eib.org/economics
economics@eib.org

Main contributors to this year's report
Report Directors: Barbara Marchitto and Debora Revoltella.
Report Coordinators: Colin Bermingham, Claudio Cali, Nina Fenton, Ricardo Santos.
Communication Editor: Daniel Berze, under the direction of Valentina Kalk, Head of Publications.
Editing: Linguistic Services, European Investment Bank and SciencePod
Coordination: Nathalie Gilson, Senior Operational Assistant, European Investment Bank

Executive Summary:	Debora Revoltella
Chapter 1:	Colin Bermingham, Emmanouil Davradakis, Koray Alper
Chapter 2:	Colin Bermingham, Emmanouil Davradakis, Muazu Ibrahim (Making Finance Work for Africa Partnership, MFW4A), Hugues Kamewe Tsafack (MFW4A) and Guy Menan (MFW4A)
Chapter 3:	Colin Bermingham, Alfredo Baldini, Frank Betz, Claudio Cali, Emmanouil Davradakis, Kevin Koerner, Francesca Mameri, Carmen Niethammer, Ricardo Santos, Sanne Zwart
Chapter 4:	Alfredo Baldini, Sai Krishna Kumaraswamy (CGAP)
Chapter 5:	Colin Bermingham, Matteo Ferrazzi, Fotios Kalantzis, Arthur Minsat (OECD Development Centre), Elisa Saint Martin (OECD Development Centre), Sanne Zwart
Chapter 6:	Giulia Scammacca del Murgo

Disclaimer

Published by the European Investment Bank.
Printed on FSC® paper..

eBook: QH-09-22-518-EN-E ISBN 978-92-861-5381-5 doi:10.2867/56231
pdf: QH-09-22-518-EN-N ISBN 978-92-861-5382-2 doi:10.2867/049837

CONTENTS

Acknowledgments

The EIB wishes to thank, first and foremost, the staff and management of the African banks who generously gave their time to complete the EIB Banking in Africa survey, 2022.

In addition to the main authors, the EIB thanks all the colleagues from the EIB, Making Finance Work for Africa Partnership (MFW4A), the Consultative Group to Assist the Poor (CGAP), MicroFinanza Ratings, Tellimer Research, the Global Private Capital Association (GPCA) and the Organisation for Co-operation and Development (OECD) whose contributions supported and enriched this report. In particular we would like to mention:

Sanja Blatt, Donal Cannon, Marius Chirila, Carmelo Cocuzza, Marc-Antoine Coursaget, David Crush (CGAP), Myriam Djari, Mihaljek Dubravko (Bank for International Settlements), Olivier Edelmen, Christian Elias, Jane Feehan, Sabrina Katz (GPCA), Eleni Kyrou, Hugues Kamewe Tsafack (Making Finance Work for Africa (MFW4A)), Sai Krishna Kumaraswamy (CGAP), Hilina Lakew Weldetekle, Patrick Le Goff, Christophe Litt, Guy Menan (MFW4A), Sonja Mohnen, Davide Monguzzi, Ibrahim Muazu (MFW4A), Arthur Minsat (OECD Development Centre), Faith Njoroge, Nicholas Nzioka, Elisa Saint Martin (OECD Development Centre), Anne Schmidt-Sheehan, Markus Schulte, Rahul Shah (Tellimer Research), Inmaculada Soto Riba, Lucia Spaggiari (Microfinanza Ratings), Jean-Philippe Stijns, Annamaria Tueske, Axel-Boris Zabo and Peter Zajc.

Foreword

The coronavirus pandemic has been the most disruptive global event in generations, leading to catastrophic loss of life and huge economic hardship. As the economic scars left by the pandemic were beginning to heal, Russia launched an unjustifiable war on Ukraine.

The war is now a major concern among African banks. Financial firms are much more worried today about a slowing economy, poor business results, rising interest rates, deteriorating loan portfolios and an increase in costs to fund their operations.

One thing our partners in Africa do not need to worry about is the level of support from the European Investment Bank. The war has elicited a decisive European response, and we will always stand firm with our African partners to respond to this latest crisis just as we strived to help them solve the biggest hardships caused by COVID-19.

Earlier this year, the European Investment Bank set up EIB Global, a new arm for global partnerships, as concrete evidence of our commitment to development. EIB Global aims to create an even more significant impact through targeted development operations and — in close cooperation with the European Union — grow ever-stronger bonds between Europe and Africa, enhance economic and trade ties between the two continents and place climate action and sustainable development at the heart of a shared agenda.

***Finance in Africa: Navigating the financial landscape in turbulent times* gauges the ability of the financial system to support these goals even in challenging times**. Africa lags behind other developing regions on many financial development indicators, but there are signs of encouraging progress: closer links have been forged with the global economy over the last decade, and domestic capital markets have shown some resilience. Private capital invested in Africa reached a new high in 2021 and microfinance institutions in sub-Saharan African have seen their loan portfolio grow faster than in any other region globally since the start of the pandemic.

Our annual survey of sub-Saharan African banks reveals some fresh concerns in 2022, including the cost of local funding. Worries about asset quality, which emerged after the pandemic, also persist. Banks expect to tighten credit standards again for their customers. But the survey also shows clear signs of optimism. A greater share of banks expect to expand their operations this year compared to last year, and they expect loan demands to increase for corporates and small and medium firms.

Many banks in Africa are telling us they want to work harder to develop climate strategies, prepare for the risks of climate change and increase green lending. The European Investment Bank is Africa's best partner on climate action, with more than half of our global lending in support of climate action and sustainability in 2021. 70% of the banks surveyed also have a gender strategy in place and sponsor women- and gender-focused initiatives in the community, up 10 percentage points from the 2021 survey.

The EIB has been active in Africa for nearly 60 years, with investments totalling €59 billion in 52 countries. Projects signed in sub-Saharan Africa in 2021 alone are expected to contribute to the vaccination of hundreds of millions against COVID-19, improve waste collection for more than 3 million people, ensure access to safer drinking water for nearly half a million people, sustain hundreds of thousands of jobs in small and mid-cap firms, and produce 374 GWh a year of electricity from renewable energy sources.

We know that Africa's transformation will require major investment — as high as $1.3 trillion in annual financing — to meet its UN Sustainable Development Goals. We will continue to do our part.

I hope that *Finance in Africa 2022* provides you with a useful overview of the African financial sector and demonstrates how we can work together for the prosperity of Africa and its people.

Werner Hoyer
President, European Investment Bank

Executive summary

The war in Ukraine is amplifying the economic problems facing Africa. The growth recovery following the pandemic is being delayed, especially for commodity importers. While some commodity exporters have seen their growth forecasts for 2022 revised upward (Chapter 1), the rate of economic growth is often little more than population growth, leading to marginal gains in income per head. Inflation was already elevated ahead of the war, partly owing to lingering pandemic-related supply chain constraints. The war has led to supply shortages for crucial commodities, including food and energy, putting upward pressure on their prices and fuelling even higher inflation rates. Compared to other regions, Africa is particularly exposed to higher food prices due to the high share of food in consumer expenditure. The rise in inflation combined with stagnating income growth is pushing even more Africans into poverty. In 2019, an estimated 424 million sub-Saharan Africans were living in extreme poverty. The pandemic and the war mean that at least 460 million people are expected to be living in extreme poverty in 2022, an increase of 36 million in the space of three years.[1]

Governments in sub-Saharan Africa are being forced to rein in fiscal deficits, which ballooned during the pandemic, limiting their ability to protect the poor and safeguard social stability. However, if governments are to significantly improve their fiscal accounts, the reversal of a long-term trend of declining government revenue will be required (Chapter 1). Debt servicing costs are higher and rising more quickly in sub-Saharan Africa compared to advanced economies, and debt sustainability will be a problem for some countries. At the same time, financing needs on the continent are significant. According to the United Nations, meeting the Sustainable Development Goals in Africa would require annual financing of $1.3 trillion, given the continent's population growth trajectory. Moreover, the International Monetary Fund estimates that $50 billion could be required to meet the costs of climate adaptation alone.[2]

The financial system is supporting important development goals such as adapting to climate change, improving financial inclusion, increasing digitalisation in the economy and promoting greater opportunities for women. However, the financial system itself needs to develop further to support these goals. One aspect of this development is to become more integrated with other financial systems globally. Financial integration, which is defined as the sum of external assets and liabilities divided by gross domestic product (GDP), is lower in sub-Saharan Africa than it is in other developing regions, although Southern Africa is an exception here given the large and integrated financial sectors in South Africa and Mauritius (Chapter 2). West Africa has the lowest level of financial integration at 76% of GDP in 2019.[3] Financial integration is at 105% of GDP in East Africa and 114% in Central Africa. At the other end of the spectrum, financial integration in the region of Southern Africa dwarfs that of other regions at nearly 400% of GDP. Increasing financial integration could support investment in Africa when domestic savings are low; improve portfolio diversification, leading to greater international risk sharing; and allow more borrowing to smooth consumption when faced with adverse shocks.

Despite the relatively low levels of financial integration in most regions of sub-Saharan Africa, there has been a significant increase in this metric since 2010. This is due to an increase in both external assets and liabilities, although liabilities have grown more quickly. Nonetheless, the growth in liabilities has been driven by both equity and debt liabilities. The growth in equity liabilities means that there has been investment in local enterprises by external investors rather than just the accumulation of external debt. Most equity liabilities have been accumulated through foreign direct investment.

Total portfolio liabilities, which are more at risk of capital flight compared to foreign direct investment, accounted for less than 5% of GDP in East and Central Africa in 2019. For West Africa, the share rose to almost

[1] Gerszon Mahler, D., Yonzan, N., Hill, R., Lakner, C., Wu, H. and Yoshida, N. (2022). "Pandemic, prices, and poverty." *World Bank Data Blog*, 13 April. Available at: https://blogs.worldbank.org/opendata/pandemic-prices-and-poverty.

[2] United Nations (2020). "Economic Report on Africa 2020: Innovative Finance for Private Sector Development in Africa." Available at: https://www.un-ilibrary.org/content/books/9789210051248; IMF (2022). "Regional economic outlook. Sub-Saharan Africa: A new shock and little room to maneuver." Available at: https://www.imf.org/-/media/Files/Publications/REO/AFR/2022/April/English/text.ashx.

[3] All measures of African regional financial integration used in the chapter are GDP-weighted based on the countries in the region (Chapter 2).

10% in 2019, up from about 5% of GDP in 2016. To put this into context, the ratio is 22% in East/Southeast Asia and 23% in South America, meaning Africa attracts significantly less of this type of financing. Southern Africa is again the exception, with portfolio liabilities at 54% of GDP for 2019. The pandemic prompted portfolio outflows from sub-Saharan Africa, mainly concentrated on equity rather than debt. The available data support the hypothesis that global risk-off periods affect sub-Saharan African portfolio flows. Thus, while there are many benefits to financial integration, it can increase the sensitivity of the economy to international shocks.

Stock market development supports economic growth by enhancing the efficient allocation of savings, as more savings are channelled into the corporate sector and the financing of investment. We observe that there is a close positive correlation between capital market depth and economic development on the continent, implying that an improvement in capital market depth is associated with an increase in economic development (Chapter 2). Reforms are necessary to enhance capital market depth and further support development goals. In addition, the investment needed to support climate change mitigation and adaptation could be partly financed through the issuance of green debt instruments. The issuance of environmental, social and governance bonds by African entities increased substantially to almost $5.1 billion in 2021, eclipsing the previous high of $3 billion set in 2018 before the pandemic. However, repeating that level of issuance in 2022 is unlikely. Green funding costs in Africa are inflated by high sovereign risk, which makes African green issuers reliant on demand from high-risk investors who are more sensitive to changes in market sentiment.

Private capital is a growing segment of the financing landscape in Africa, and fundraising returned to pre-pandemic levels in 2021. Moreover, private investment reached new highs in 2021. African private investment remained resilient in 2020 despite the pandemic, growing to $4.3 billion from $3.9 billion in 2019 as pipeline and existing deals were completed (Chapter 2). In 2021, deal value grew again to $6.3 billion, representing an increase of 48% on 2020. The increase in investment in 2021 was driven largely by the venture capital side, which saw deal value increase from $485 million in 2020 to $3.23 billion in 2021, and roughly half of this investment was in FinTech.

The European Investment Bank (EIB) has completed its annual survey of banks in Africa in 2022, supported by Making Finance Work for Africa. It elicited responses from 70 banks in sub-Saharan Africa, accounting for approximately 30% of the continent's assets. The survey was carried out between April and June 2022, meaning that the impact of the war in Ukraine had already begun to shape banks' perceptions.

The EIB Banking in Africa survey for 2022 shows that, following the outbreak of the war in Ukraine, the main concerns for banks are the cost of local currency funding, competition from the non-banking sector and deteriorating asset quality (Chapter 3). Last year, following the onset of the pandemic, banks were chiefly worried about asset quality, and had little concern about local currency funding costs. However, with central banks in many countries raising domestic interest rates and bond funding becoming more expensive due to tighter global financial conditions, there has been a significant increase in banks worried about funding costs.

The reduction in asset quality to date is worse for the small and medium enterprise (SME) portfolio than for large corporates. In addition, headline non-performing loan figures do not tell the whole story — there are significant shares of loans under moratoriums or restructuring (Chapter 3). Banks' concerns about asset quality suggest that higher non-performing loans are likely in some countries as support measures are wound down and tough global economic conditions persist. Banks plan to tighten lending standards for a third consecutive year in 2022. Lack of collateral and poor credit history are key barriers to giving finance, especially to small and medium firms. These factors repeatedly feature in our survey, suggesting they are structural problems, although they may be aggravated by cyclical factors.

Banks expect to see increased credit demand, and they also plan to expand their own operations, which will in turn require an expansion of their funding. The share of banks planning to expand lending operations is somewhat higher in the survey for 2022 compared to 2021 (Chapter 3). Despite clear concerns about asset quality, the mood that seems to characterise the sector is therefore one of cautious optimism.

Banks across the region are stepping up efforts to increase access to finance for women. 70% of the banks surveyed have a gender strategy in place and sponsor women- and gender-focused initiatives in the community, an increase of 10 percentage points on the share in the 2021 survey. The 2022 Banking in Africa survey dispels any remaining misconceptions related to women and asset quality. In fact, almost 30% of banks surveyed

observed no differences in default and non-performing loan rates between male and female portfolios. In addition, four in ten banks found that non-performing loan rates for women-led businesses are lower than the average rate of their loan portfolios.

Microfinance institutions in sub-Saharan Africa saw cumulative growth of about 30% in their loan portfolios between 2019 and 2021, meaning growth has been faster there than in other parts of the world (Chapter 3). However, asset quality issues remain, and some institutions have low capitalisation. The solvency concerns are greatest for the smaller microfinance institutions, as they have a higher share of problem loans. However, these are also the institutions that have a greater share of rural and female borrowers. Their failure would therefore reverse many gains made in financial inclusion over the last decade.

The rollout of FinTech continues to transform the traditional banking-dominated financial sector across the continent. The entire FinTech ecosystem in Africa has experienced rapid growth. As of April 2022, there were more than 1 000 active companies, up from 450 in 2020 (Chapter 4). Of these, 80% are homegrown and 20% come from outside Africa. Payments and lending services are still the dominant products, but the sector has diversified. Key growth areas include software solutions and the use of blockchain technology. Other products' share of the pie (comprising a diverse mixture of areas, including cybersecurity and regtech[4]) has also grown.

Banks in sub-Saharan Africa offer many digital services to retail clients and to firms (Chapter 4). Within the region, our survey shows that the share of banks providing digital applications or services ranges from a minimum of 80% in Central Africa to more than 95% in West Africa (mostly driven by Nigeria). Domestic money transfers (87%), receiving payments from customers (85%) and paying bills or suppliers (79.6%) are the top three most requested services. To further accelerate the digitalisation of financial services, almost nine out of ten banks surveyed across sub-Saharan Africa are investing in improving the digital skills of their staff and management via dedicated training programmes. However, there are also constraints on increasing digitalisation, including the need to address concerns around cybersecurity and improve information technology infrastructure. Indeed, more than 74% of banks surveyed rank cybersecurity risks as the most common constraint across all regions.

The EIB climate country risk scores show that sub-Saharan Africa is the region most exposed to physical risk in the world. The key risks from climate events are loss of agricultural output, damage to infrastructure and growing water scarcity (Chapter 5). Many of the countries most exposed to the direct physical impacts of climate change are also among those least able to adapt. While transition risk is low compared to other regions, some sub-Saharan African countries do face high transition risks. Economies such as Algeria, Egypt, Ghana, Côte d'Ivoire, Niger, Nigeria, Senegal, Republic of the Congo, Cameroon, Angola and Mozambique are more at risk due to their dependence on fossil fuel extraction. Environmental degradation also imposes a huge cost on African countries. According to new estimates of the cost of air pollution in Africa, ambient particulate matter pollution caused at least 383 000 premature deaths in Africa in 2019.[5] This represented about 7.4% of total premature deaths in the region, up from only 3.6% in 1990.

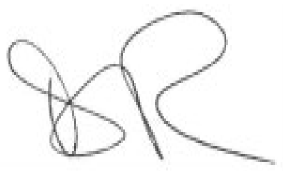
Sub-Saharan African banks are reacting to the multifaceted challenges posed by climate change. This is clearly illustrated by our survey: 53% of banks already have a formal climate change strategy in place, and a further 26% plan to introduce one, meaning that almost four out of five banks could soon have formal strategies (Chapter 5). Reducing the financial risk stemming from climate change, cited by more than 80% of the banks in our survey, is one of the main reasons for banks to define a climate strategy. Climate change may also create opportunities, however, with more than 80% of banks also citing this as a reason to have a climate strategy. Nearly 70% of banks see climate lending as an opportunity, making it the main way that banks hope to benefit from fighting climate change. To date, only one-fifth of banks have introduced green lending products, so the large gap between the share of banks that see climate lending as an opportunity and the share of those that have already launched products means there is significant scope to expand green lending. However, banks will need support. About 60% cite a lack of expertise, data and tools for assessing climate risk as a barrier to doing more to identify climate risks and opportunities.

[4] Regtech is short for regulatory technology, which refers to the use of big data and machine learning technology to enhance compliance with financial regulations.
[5] AUC/OECD (2022). "Africa's Development Dynamics 2022: Regional Value Chains for a Sustainable Recovery." OECD Publishing, Paris. Available at: https://www.oecd.org/dev/africa-s-development-dynamics-3290877b-en.htm.

The EIB has been investing in Africa since 1965, supporting infrastructure projects, innovative firms, renewable energy schemes, the public sector and private companies — from microenterprises to the largest multinationals — with investments worth €59 billion in 52 African countries (Chapter 6). In 2021 alone, the EIB signed agreements for investments benefiting operations worth €2 billion in sub-Saharan Africa under a dedicated ACP Investment Facility.[6] These operations represent approximately one-quarter of the Bank's total investments beyond Europe.

The EIB has a well-established project appraisal and impact framework in place to track and assess both the financial viability and the expected outcomes of individual projects using a formalised set of indicators. In sub-Saharan Africa, projects signed in 2021 are expected to help 420 million people get vaccinated against COVID-19, 3.2 million people benefit from improved waste collection, 455 229 people access safer drinking water, sustain 375 354 jobs in small and medium firms, microenterprises and mid-cap companies, and produce 374 GWh/year of electricity from renewable energy sources. Our latest report[7] details the results of the Bank's activities beyond Europe.

In November 2021, the EIB set up a fully dedicated branch to further strengthen our engagement beyond Europe: EIB Global. EIB Global is committed to delivering even more development impact through its targeted operations, helping reinforce the bonds between Europe and Africa, enhancing economic and trade ties between the two continents and putting the European Union's climate action and development at the heart of their shared agenda.



Debora Revoltella
Director, Economics Department
European Investment Bank

[6] The Investment Facility refers to a revolving fund established under the EU-ACP Partnership Agreement (or Cotonou Agreement) where revenue was reinvested in new financing operations for investment projects in the region using a broad range of flexible risk-bearing instruments, such as local currency lending, investment grants and guarantees.
[7] Available at: https://www.eib.org/en/publications/online/global-reports-2022.htm.

1

Macroeconomic situation in Africa

This chapter is authored by Colin Bermingham and Emmanouil Davradakis of the European investment Bank. The authors acknowledge with gratitude the contribution from Koray Alper of a box on risk premiums for African sovereigns.

The authors would like to thank Claudio Cali, Barbara Marchitto, Debora Revoltella and Ricardo Santos for their comments on earlier versions.

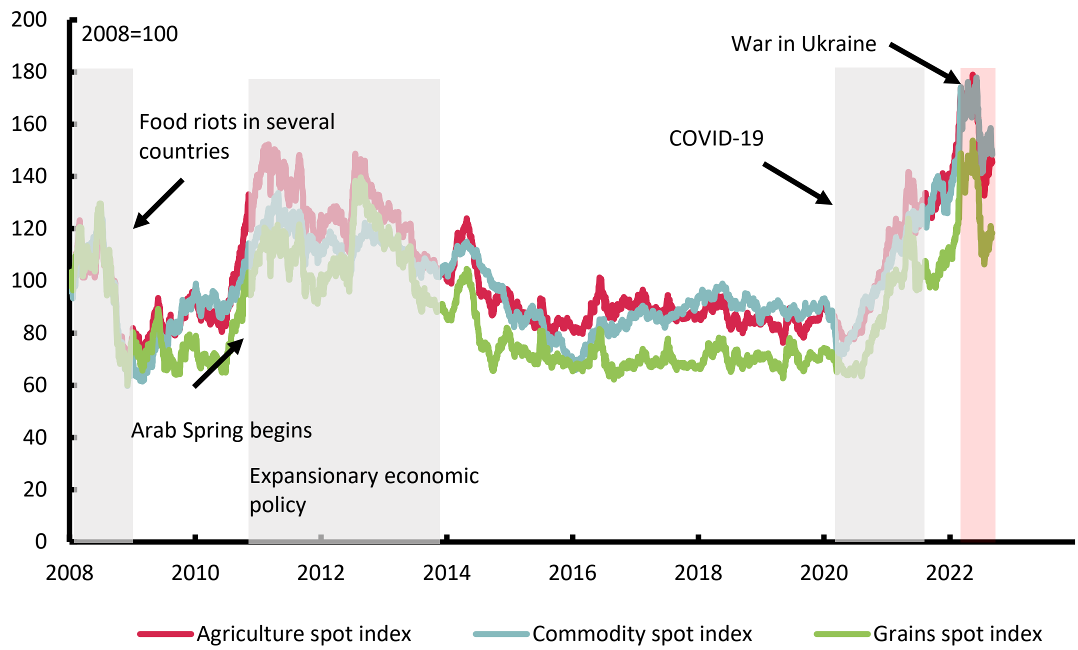
Key messages

The war in Ukraine is another shock to the African continent as it recovers from the coronavirus pandemic. Many African countries were already facing additional challenges in supporting domestic economic growth compared to advanced economies for reasons including less fiscal space, less comprehensive vaccine coverage, lower levels of investment and more vulnerability to changes in international risk appetite. The rise in inflation due to higher food and energy prices means households are seeing their incomes squeezed, pushing more people into poverty. COVID-19 has stretched the capacity of fiscal policy in emerging and developing economies to contain the food shock and safeguard social stability. Indeed, fiscal consolidation is expected to continue on the continent in 2022 but the cost of servicing debt is also increasing, not least because central banks continue to increase interest rates to deal with high inflation. This means debt sustainability problems could spread to more countries but mechanisms to deal with insolvent countries remain slow, given an increasingly diverse set of creditors. The increased lending to governments by banks during the pandemic also risks crowding out lending to the private sector.

Macroeconomic situation in Africa

The war in Ukraine has slowed post-COVID recovery and is exacerbating many of the African continent's structural challenges. The war is a supply shock, putting further upward pressure on the price of oil, agricultural products and metals (Figure 1). Economic recovery from the pandemic in developing economies was already lagging behind that in advanced economies for a variety of reasons, including less fiscal space, less comprehensive vaccine coverage, high debt ratios and more vulnerability to changes in international risk appetite. The Organisation for Economic Co-operation and Development (OECD, 2022) has shown that Africa's gross domestic product (GDP) as a share of global GDP has been broadly trending downward since 2010 and is likely to account for approximately 4.7% of global GDP in 2022 — its lowest share in more than 20 years. Weaker economic performance is hampering poverty reduction. In 2019, an estimated 424 million sub-Saharan Africans were living in extreme poverty. The pandemic is predicted to have increased this to 448 million in 2020. The upward trend is continuing, with at least 460 million expected to be living in extreme poverty in 2022, an increase of 36 million in the space of three years (Gerszon Mahler et al., 2022).

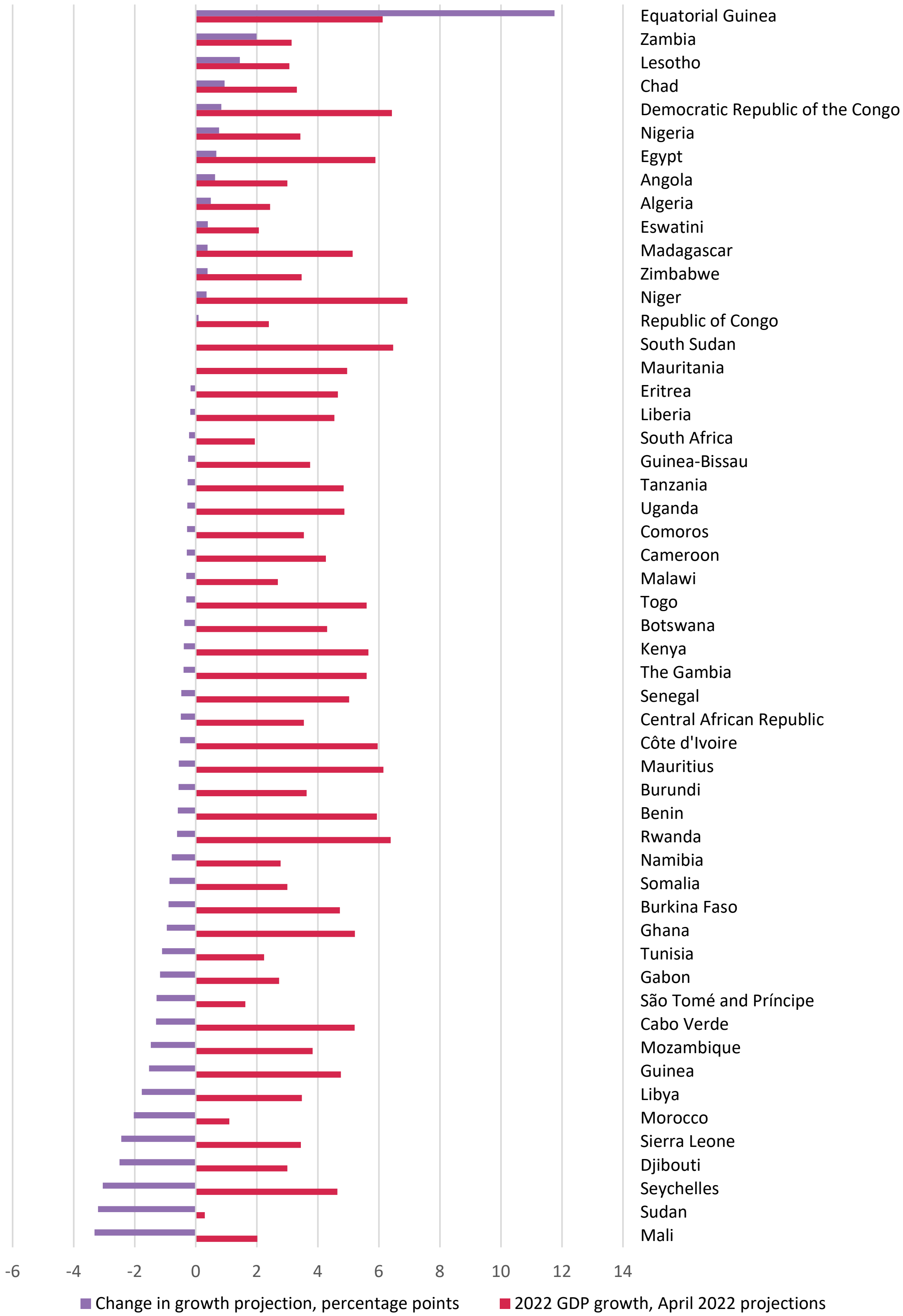
Figure 1. International commodity prices



Source: Bloomberg and authors' calculations.

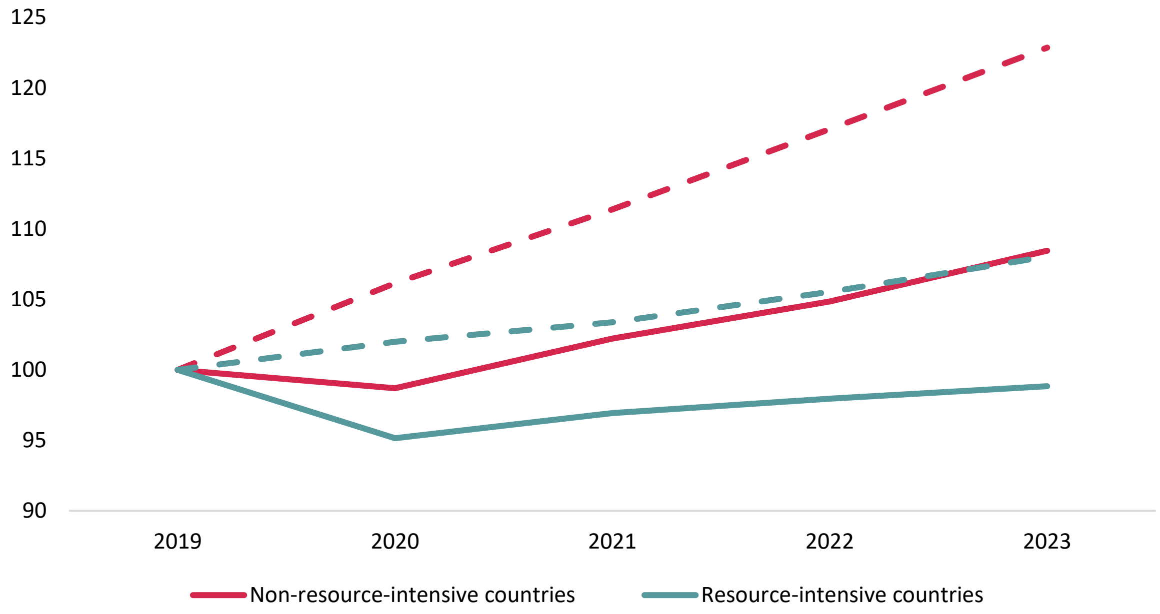
In its April 2022 World Economic Outlook, the International Monetary Fund (IMF, 2022a) forecast that growth in sub-Saharan Africa would slow from 4.5% in 2021 to 3.8% in 2022 before firming to 4.0% in 2023. The forecasts for 2022 and 2023 were little changed from the previous forecasts made before the war, in October 2021, but this masks significant heterogeneity at the country level. Owing to higher commodity prices, commodity-exporting economies saw upgrades to their growth forecasts, including Equatorial Guinea, Chad, Democratic Republic of Congo and Nigeria (Figure 2). However, approximately two-thirds of countries in sub-Saharan Africa had their 2022 growth forecast cut. Tourism-dependent nations continue to suffer, and commodity importers are facing an income shock through deteriorating terms of trade.

Figure 2. GDP growth in Africa, 2022 (in %) and change to growth projections compared to 2021 (in percentage points)



The slowdown in GDP growth means increases in income will be constrained. Real per capita GDP is expected to remain below pre-pandemic levels until at least 2024 for resource-intensive (commodity-exporting) countries, with growth of just 1% per year in 2022 and 2023 (Figure 3). Growth of above 2% had been expected before the pandemic. Part of the problem is that some key oil exporters have been unable to expand production to benefit from rising oil prices, and growth rates for exporters have actually lagged behind those of commodity-importing countries. This shows that while commodity exporters have had their growth forecasts marked up, their growth rates remain below those of other countries, and the commodity price boom is not translating into a surge in income for the population. Nonetheless, external balances and fiscal metrics have generally improved.[1] Prospects for wealth growth are a bit better for non-resource-intensive countries, with per capita GDP already 5% above pre-pandemic levels in 2022. However, per capita GDP growth should average 3% in 2022/2023, compared to a pre-pandemic growth estimate of 5%, contributing to a wide gap in expected per capita GDP for this group by 2023.

Figure 3. Sub-Saharan Africa real per capita GDP growth 2019-2023, current versus pre-pandemic forecasts



Source: IMF World Economic Outlook database (October 2019 and April 2022[2]) and authors' calculations.
Note: 2019 = 100; dashed lines show pre-pandemic forecasts.

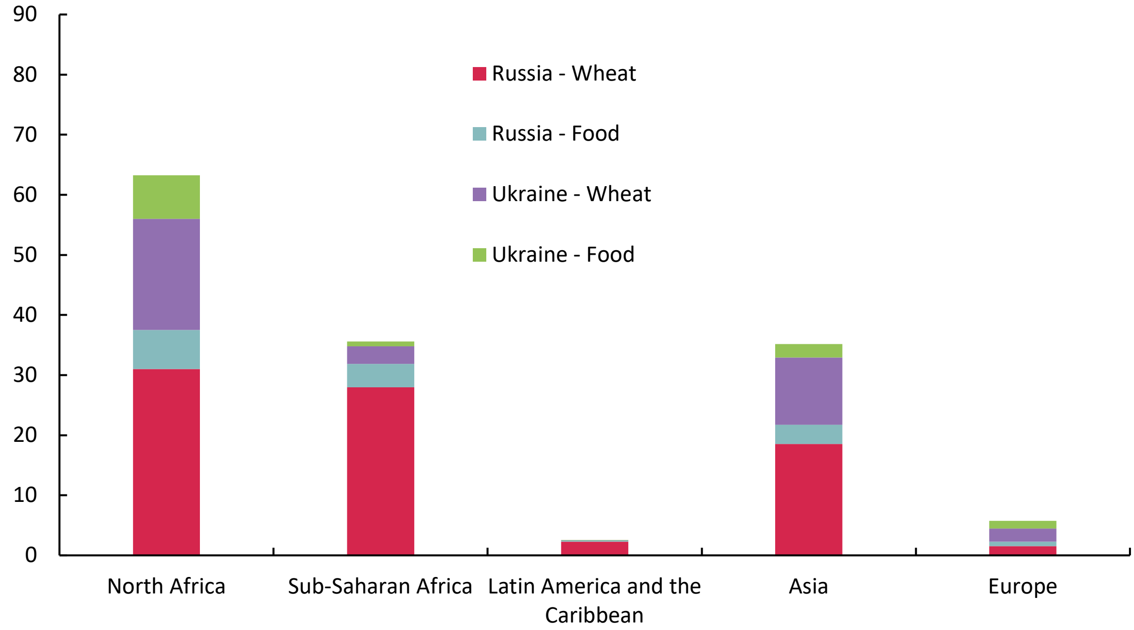
While the rise in oil prices is reflected prominently in growth forecasts, the rise in food prices threatens civil unrest. Together, Russia and Ukraine account for 52% of the share of global trade in sunflower oil/seeds and 24% of global trade in wheat (United Nations Comtrade Database, 2020).[3] Rising corn prices could also lead to higher costs for animal feed and trigger further price increases for meat. Rising prices threaten food security and political stability. In 2011, the Arab Spring in North Africa coincided with rising international food prices. Prior to that, food riots broke out in many developing countries in 2008 when food prices also spiked. As shown in Figure 1, rapid increases in commodity prices since the war in Ukraine broke out mean food prices temporarily eclipsed previous highs, though they have fallen back somewhat since then..

Africa is highly dependent on Russia and Ukraine for the security of its wheat supply. Africa is a large net importer of wheat, even though it is on aggregate a food exporter. In 2018-2020, the continent imported on average $3.7 billion in wheat (32% of total African wheat imports) from the Russian Federation and another $1.4 billion in wheat from Ukraine (12% of total African wheat imports). Food and wheat imports from Russia and Ukraine account for a large share of total food imports for Africa. As many as 25 African countries, including

[1] Nigeria, as the largest economy in sub-Saharan Africa, is a notable exception in that its fiscal balance has been deteriorating despite the increase in oil prices. It exports crude oil products, with production volumes in decline, while it imports refined products which it subsidises at a significant cost. These even prevent fiscal balances from improving.
[2] https://www.imf.org/en/Publications/SPROLLs/world-economic-outlook-databases#sort=%40imfdate%20descending.
[3] https://comtrade.un.org/.

many least developed countries, import more than one-third of their wheat from Russia and Ukraine, and 15 of them import more than half. Exposure — particularly to Ukrainian supply — is especially high in North Africa (Figure 4).

Figure 4. Share of wheat and food item imports from Russia and Ukraine (as a % of total wheat and food imports), by region, 2020



Sources: UNCTAD (2021) *and authors' calculations.*

African households will see their incomes squeezed due to high food prices. Vulnerability to high food prices for a country or region can be characterised in terms of both dependence on food imports and the share of food in the consumer price index, which gives an idea of how much of the average household budget is spent on food. In Figure 5a, countries above the red line are net food importers (in percentage of GDP), while countries further to the right spend a higher share of household income on food. Sub-Saharan Africa is similar to several other regions in terms of external food dependence but is especially vulnerable to price rises given the high share of income spent on food. Rising energy prices compound the problem, although energy accounts for a smaller — albeit still very significant — share of household expenditure, and the region is a net exporter of oil. Food and energy prices account for a large share of household expenditure for poorer households, making the impact more severe. The combined increase in food and energy prices will depress household income, constrain expenditure on other essentials and increase poverty.

Figure 5a. Impact of rising food prices on inflation

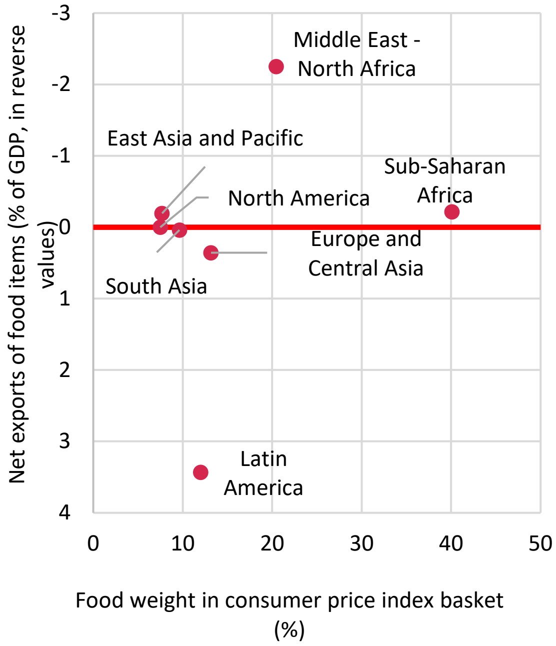
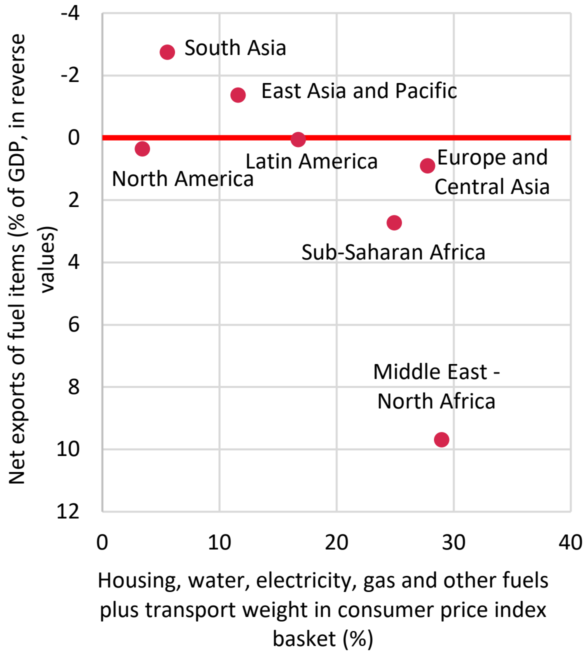


Figure 5b. Impact of rising energy prices on inflation



Source: IMF, UNCTAD and authors' calculations.

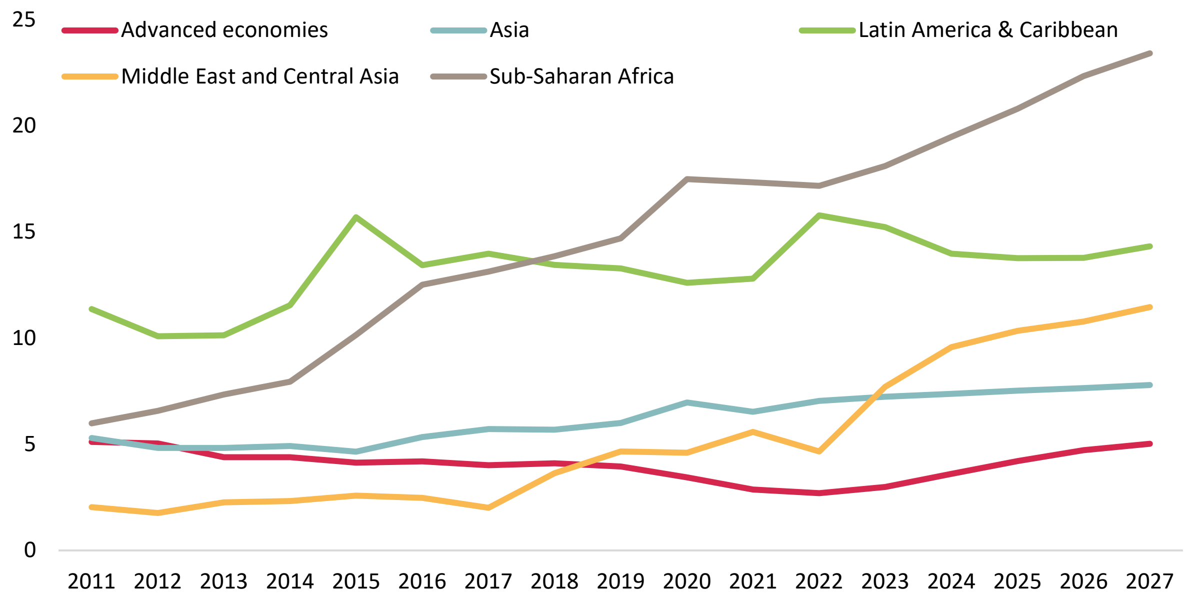
The coronavirus pandemic has stretched the capacity of fiscal policy in emerging and developing economies to contain the food shock and safeguard social stability. Government debt in sub-Saharan Africa increased from 28% of GDP in 2012 to 50% in 2019, and the pandemic pushed it up to 57% of GDP in 2021. The overwhelming majority of emerging and developing economies ran an expansionary fiscal policy during the pandemic to support economic activity and widen social safety nets. The IMF estimated this fiscal stimulus to be 9.9% of GDP in emerging economies and 4.1% of GDP in developing economies.[4]

Governments now face an unwelcome combination of tightening fiscal policy and rising borrowing costs. Following the fiscal support measures introduced in 2020, government deficits in sub-Saharan Africa are expected to decline for a second consecutive year in 2022 as countries confront high debt levels. This means large-scale stimulus of the sort witnessed during the pandemic will not be repeated to offset the impact of the war. Consequently, social safety nets will be insufficient in some cases. Of course, for countries less impacted by the war, there will be less need for a strong fiscal response.

Despite ongoing fiscal consolidation, the debt burden is increasing in the poorest nations. Low-income countries tend to raise a smaller share of revenue in GDP than advanced countries. Consequently, debt-servicing costs are both higher and rising more quickly in most developing regions (Figure 6) than in advanced countries, and Africa is particularly affected, as shown by the box in this chapter. The war is adding to these pressures, as deteriorating risk sentiment is leading to higher sovereign bond yields. With government revenue in sub-Saharan Africa falling from 22% of GDP in 2011 to 17% in 2021, the region is particularly disadvantaged. Indeed, seven African countries are already in debt distress, and 15 are at high risk (IMF, 2022b). Sub-Saharan Africa received $23 billion in IMF special drawing rights in 2021 to strengthen external positions and support urgent public spending. Moreover, in October 2021, G20 economies committed to providing $100 billion of their special drawing rights holdings to vulnerable countries, especially in Africa. The position was reiterated at the summit between the European Council and the African Union in February 2022, where leaders welcomed the $55 billion that had already been pledged ($13 billion from EU countries).[5]

[4] IMF Fiscal Monitor: database of country fiscal measures in response to the COVID-19 pandemic, October 2021, Available at: https://www.imf.org/en/Topics/imf-and-covid19/Fiscal-Policies-Database-in-Response-to-COVID-19.
[5] European Parliamentary Research Service briefing, available at: https://www.europarl.europa.eu/RegData/etudes/BRIE/2022/733531/EPRS_BRI(2022)733531_EN.pdf.

Figure 6. Government debt-servicing costs (% of government revenue)

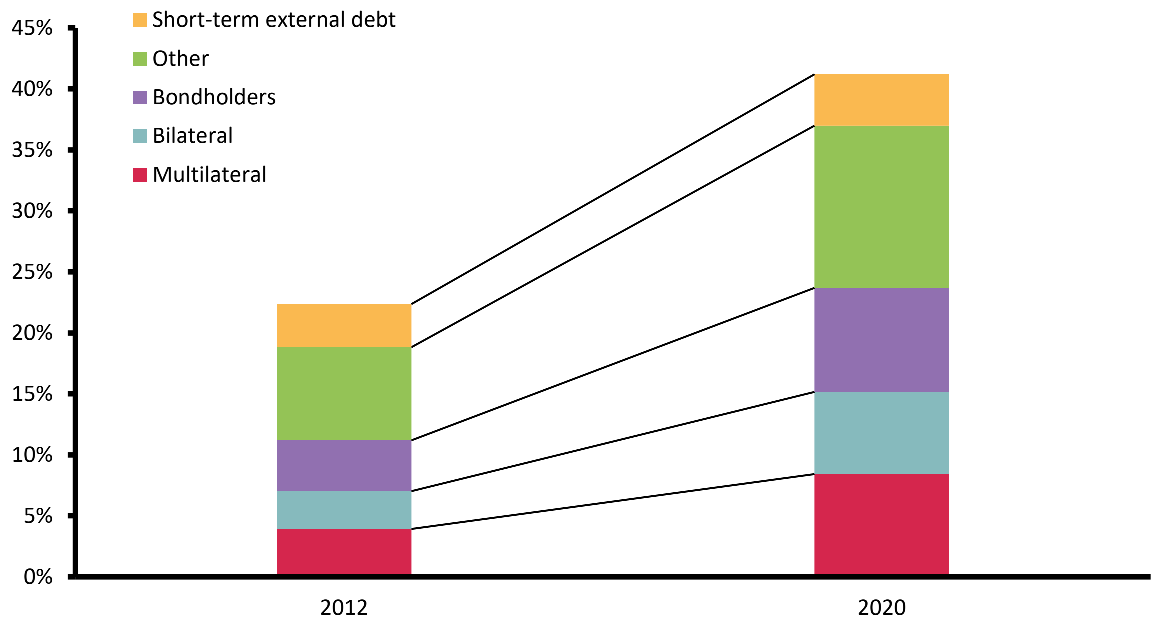


Sources: IMF WEO Outlook Database April 2022 and authors' calculations.

Rising debt levels and higher debt-servicing costs mean that debt sustainability will continue to be a problem for some countries. However, dealing with insolvent countries has become more difficult on a practical level. The current debt resolution architecture was mainly designed to deal with multilateral and bilateral creditors. In recent years, however, low-income countries have seen a change in their creditor composition, and private sector creditors such as bondholders are now more prominent (Figure 7). China has also become the largest individual creditor to the African continent, and its lending is generally done on commercial rather than concessional terms.[6] Thus, there is a wider set of creditors to consult when it comes to debt restructuring and China plays a crucial role. Historically, China has typically negotiated bilaterally with borrowers behind closed doors, but in April 2022 it agreed to join the creditor committee for Zambia and was part of the official creditor committee that agreed to debt restructuring on 30 July.

[6] Boston University Global Development Policy Center (2022) has shown that Chinese lending to sub-Saharan Africa shrank to just $1.9 billion in 2020, down 77% from 2019, when Chinese lenders extended $8.2 billion worth of credit. Credit from Chinese lenders to Africa peaked at close to $28 billion in 2016, meaning it has significantly slowed its flow of financing to Africa. The biggest borrowers from China have been Angola, Ethiopia and Zambia. This means China has an important role to play in common framework negotiations for Ethiopia and Chad.

Figure 7. Sub-Saharan Africa composition of public debt 2010 and 2020 (% of GDP)



Source: IMF Regional Economic Outlook (2022a), based on World Bank International Debt Statistics (2022) and IMF World Economic Outlook Database (April 2022).

Box 1. Risk premiums on African sovereign issuances

Most emerging and developing countries suffer from a low level of domestic savings relative to their investment needs. Therefore, they seek out foreign funding. However, not all countries have access to international financial markets, and even for those who have access, the cost of foreign funding may be very high. The main factor driving the cost of funding for emerging and developing countries is their sovereign creditworthiness. This can be measured by credit default swaps spreads, which are available for a sub-set of African countries.[7]

Like other emerging and developing economies, the sovereign risk premium for African countries have seen two significant hikes around the two global shocks: the COVID-19 pandemic (February 2020) and the Russian invasion of Ukraine (Figure 8):

- **The hike in premiums in the pandemic crisis was much sharper, but short-lived**. Four countries (Angola, Gabon, Ghana and Nigeria) saw their credit default swaps increase beyond 1 000 basis points. However, about a year after the spreads peaked, credit default swap levels for all countries (except Ethiopia) almost came back to their pre-crisis level (Figure 9).

- **The rise in credit default swap spread following the outbreak of the war has so far been more limited in magnitude compared to the pandemic**. However, African credit default swap spreads have not fallen back from their peaks. Instead they maintained an upward trend, meaning the shock has been more enduring. Since the war started, six out 15 countries saw their credit default swaps around or above 1 000 basis points, while just before the war, only two countries' risk premiums were at around or above those levels. As of September 2022, three quarters of African countries (for which credit default swaps are available) have to pay a risk premium (in their new issuances) at or above 600 basis points. For the median country this figure is as high as 720 basis points (Figure 10). Given the high and increasing risk-free interest rates (for example yields on ten-year US treasury rates), the current level of risk premiums will quickly have implications for debt dynamics.

[7] The analysis focuses on the countries for which credit default swaps data are available: Algeria, Angola, Cameroon, Egypt, Ethiopia, Gabon, Ghana, Kenya, Morocco, Namibia, Nigeria, Rwanda, Senegal, South Africa and Tunisia. They account 56% of the continent's population.

Figure 8. Credit default swaps on African sovereigns (basis points)[1,2]

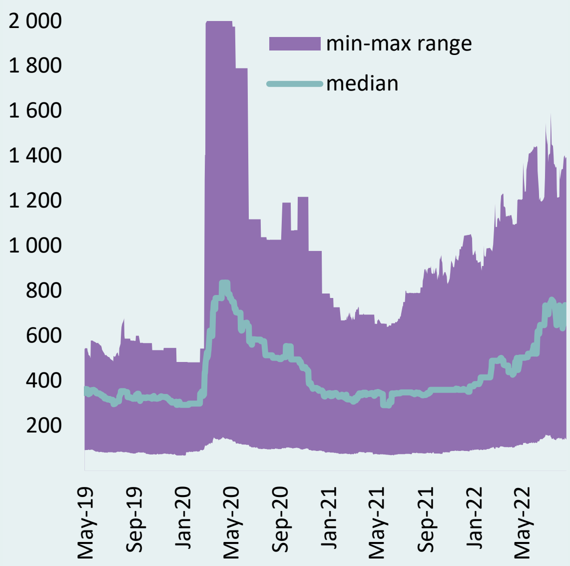
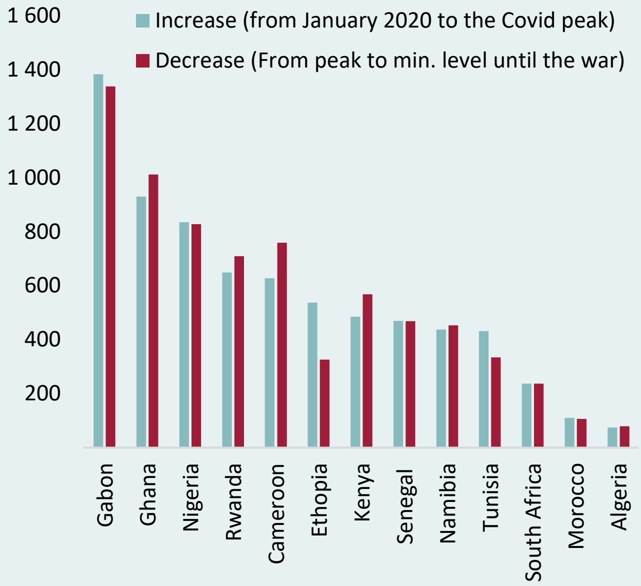


Figure 9. Changes in credit default swaps before and after February 2022 (basis points)

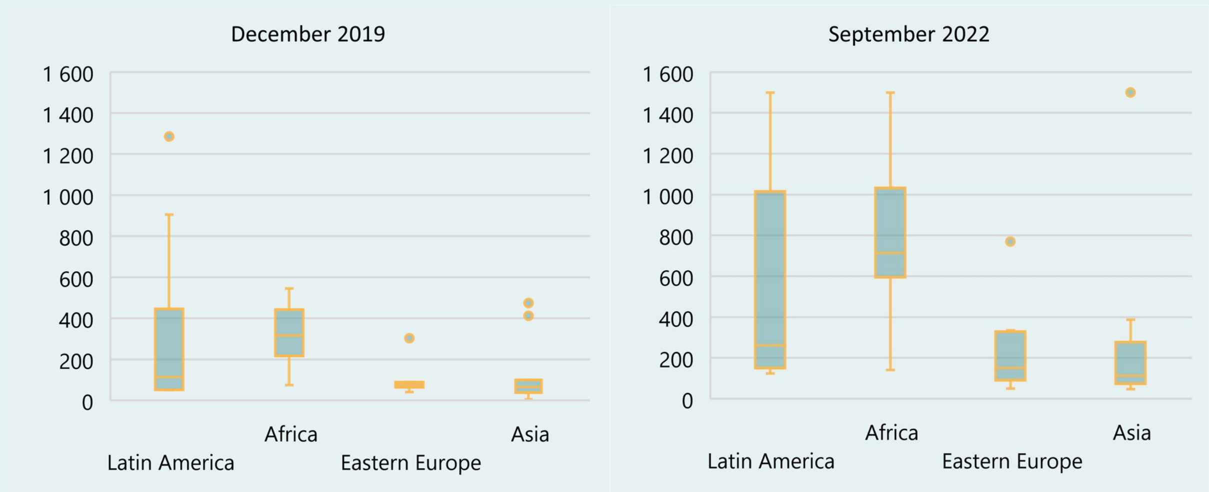


(1) Ethiopia and Ghana are excluded due to lack of data before 2022.
(2) For the sake of illustration, maximum value of credit default swaps is capped to 2 000 basis points.

The marked deterioration in creditworthiness of African countries partly reflects country specific circumstances, but on average, they have fared worse than other emerging and developing economies. Even before the Russia-Ukraine war broke out, Ethiopia and Ghana credit default swaps were on a discernible upward trend while other countries had broadly stable risk premiums. However, a regional comparison shows that while all emerging and developing economies have been affected negatively from the two shocks, the deterioration in African countries is much more pronounced. Figure 10 shows that almost all African countries saw a sizeable increase in their sovereign risk premiums. The median increase in sovereign risk premiums in Africa is around 400 basis points (Figure 10); in Latin America, the second worst hit region, the median increase is just 150 basis points. The changes in other regions are much more muted.

The sizeable rise in risk premiums for African countries are mainly due to weak fundamentals, which make them more vulnerable to market setbacks and the large idiosyncratic shocks that some countries had suffered. Therefore, in order to increase resilience against global and domestic shocks, African economies have to strengthen their buffers, improve macroeconomic stability and improve the policy credibility.

Figure 10. Distribution of sovereign risk premiums in different regions[1,2]



(1) For the sake of the clarity of illustration, all credit default swap values greater than 1 500 basis points are set to 1 500 basis points.
(2) Box plot is an interquartile range with the middle bar representing the median and the dots above the box showing the outlier values.

References

Boston University Global Development Policy Center (2022). "How Chinese lending to Africa Changed during the COVID-19 Pandemic" Available at: https://www.bu.edu/gdp/2022/04/25/how-chinese-loans-to-africa-changed-during-the-covid-19-pandemic/.

Gerszon Mahler, D., Yonzan, N., Hill, R., Lakner, C., Wu, H. and Yoshida, N. (2022). "Pandemic, prices, and poverty." World Bank Data Blog, 13 April. Available at: https://blogs.worldbank.org/opendata/pandemic-prices-and-poverty.

IMF (2017). "Sub-Saharan Africa Regional Economic Outlook: Fiscal Adjustment and Economic Diversification." April. Available at: https://www.imf.org/en/Publications/REO/SSA/Issues/2017/10/19/sreo1017.

IMF (2021). "World Economic Outlook Database." Available at: https://www.imf.org/en/Publications/SPROLLs/world-economic-outlook-databases#sort=%40imfdate%20descending.

IMF (2022a). "World Economic Outlook*:* War sets back the global recovery." Available at: https://www.imf.org/en/Publications/WEO/Issues/2022/04/19/world-economic-outlook-april-2022.

IMF (2022b). "List of LIC DSAs for PRGT-Eligible Countries." Available at: https://www.imf.org/external/Pubs/ft/dsa/DSAlist.pdf.

OECD (2022). "Africa's development dynamics 2022: regional value chains for a sustainable recovery." Available at: https://www.oecd.org/dev/africa-s-development-dynamics-3290877b-en.htm.

UNCTAD (2021). "e-Handbook of Statistics." Available at: https://unctad.org/statistics.

2

Financing economic development in Africa

This chapter is authored by Colin Bermingham and Emmanouil Davradakis of the European Investment Bank. The authors gratefully acknowledge the contribution of a box on the Africa Long-Term Finance Initative by Muazu Ibrahim, Hugues Kamewe Tsafack and Guy Menan, all members of Making Finance Work for Africa (MFW4A).

The authors would like to thank Claudio Cali, Mihaljek Dubravko, Barbara Marchitto, Debora Revoltella and Ricardo Santos for their comments on earlier versions.

The views expressed here are those of the authors and do not necessarily reflect those of the European Investment Bank. Any errors are the responsibility of the authors.

Key messages

Further financial sector development in Africa could help support important development goals such as adapting to climate change, improving financial inclusion, increasing digitisation in the economy and promoting greater opportunities for females. Financial integration, which is defined as the sum of external assets and liabilities divided by gross domestic product, is lower in most Sub-Saharan African regions compared to other developing regions but there has been notable growth in financial integration in Sub-Saharan Africa since 2010. This bring benefits such as facilitating greater inward investment and the data show that investment from abroad has been an important driver of higher external liabilities since 2010. However, a drawback of greater financial integration is that it increases the sensitivity of the economy to external shocks, such as capital outflows during periods of global risk aversion. In a more financially integrated economy, policymakers need to be more conscious of the trade-offs between monetary, fiscal and prudential policy.

Stock market development supports economic growth by enhancing the efficient allocation of savings. We observe that there is a close positive correlation between capital market depth and economic development on the continent, implying that an improvement in the capital market depth is associated with an increase in economic development. At the country level, stock market capitalisation is generally small compared to GDP, with some exceptions, notably South Africa. Reforms are necessary to enhance capital market depth and further support development goals.

The issuance of ESG bonds by African entities increased substantially to almost $5.1 billion in 2021, eclipsing the previous high of $3 billion set in 2018 before the pandemic, with a significant increase in the issuance of sustainability-linked loans and sustainability bonds. Banks and sovereigns were the principal issuers of ESG financial instruments in Africa in 2021. Historically, ESG issuance in Africa has been dominated by corporate issuers so recent developments point to a wider range of actors getting involved in ESG financing. Nonetheless, the size of the green debt market in Africa is still small on a global scale and green funding costs are inflated by high sovereign risk.

African private capital markets also had a strong year in 2021. Fundraising reached pre-pandemic levels, following a significant fall during the pandemic. Private investment, which had remained quite resilient during the pandemic, grew by 48% annually to reach $6.3 billion, surpassing the previous peak of $5.4 billion set in 2014/2015. The increase in investment in 2021 was driven largely by the venture capital side, which saw deal value increase from $485 million in 2020 to $3.23 billion in 2021, and roughly half of this investment was in FinTech. Nigeria was the largest market for private equity/venture capital investment in 2021, followed by South Africa. Private equity is also contributing to the growth of green financing. There has been a surge in fundraising for climate-focused investing in recent years. However, like green financing, tougher market conditions in 2022 mean the record volumes seen in 2021 are unlikely to be repeated.

Introduction

Africa's development is at a crossroads, with the continent seeking to accelerate economic growth to meet its development goals, in line with the African Union's Agenda 2063 and the Sustainable Development Goals (SDGs), by 2030. However, according to the United Nations (2020), meeting the SDGs in Africa would require annual financing of $1.3 trillion, given the continent's population growth trajectory. Moreover, the International Monetary Fund (IMF, 2022) estimates that $50 billion could be required to meet the costs of climate adaptation alone. To date, long-term finance (LTF) has been raised using debt, equity, bonds, private equity and venture capital, public-private partnerships and through development banks.

The continent faces some significant challenges when trying to raise finance. The development of local markets and participation in the international bond capital markets are constrained. Africa is less financially integrated with the global economy than other regions, and its domestic capital markets remain comparatively small. The growth of green finance has been a positive development — and a wider range of institutions have started to use it — but the market again remains small on a global scale. Meeting the continent's financing needs must include greater domestic resource mobilisation, not only because government revenue generation has been on a downward trend but also to give greater ownership of the economic transition to African nations.

Given the financing requirements, this chapter reviews trends in external financing and the depth of financial markets in Africa. We begin by analysing the international element of financing, documenting the evolution of cross-border financial assets and liabilities in sub-Saharan Africa. The second part of the chapter looks at the size of domestic equity markets and the link between domestic capital market size and economic development. Together, the analysis illustrates the financial landscape in sub-Saharan Africa. This chapter also introduces the African Long-Term Finance Initiative (ALTFI), a joint effort of the African Development Bank (AfDB) and the Making Finance Work for Africa (MFW4A) Partnership. The ALTFI provides an important new tool documenting financing trends over time.

Financial integration in sub-Saharan Africa

A country's external financing position provides insight into the importance of external financial flows to financing its development. In examining external assets and liabilities, we rely heavily on the external wealth of nations database (Lane and Milesi-Ferretti, 2018) and a series of papers from the creators of the database, including a recent paper on global financial integration following the global financial crisis (Lane and Milesi-Ferretti, 2018). That paper compared emerging markets and developed markets as two groups, whereas this analysis focuses specifically on sub-Saharan Africa, breaking it down into four regions: Central (eight countries), West (16 countries), East (ten countries) and Southern (14 countries).

Financial openness, when a country has significant external assets and liabilities, can provide major benefits. As detailed in Agenor (2003), it improves portfolio diversification opportunities for investors, potentially leading to higher risk-adjusted returns. Countries accessing international markets can borrow to smooth out consumption when faced with adverse shocks or to fund investment when domestic savings are too low. Obstfeld (1994) also argues that the potential gains from international risk sharing can be large and permanent.

However, increased integration may also leave a country more vulnerable to international financial shocks. This is important because it is likely to increase the pro-cyclicality of financial flows, which can undermine financial and macroeconomic stability. It could also result in sudden stops in capital inflows during difficult periods and the imposition of capital controls. Indeed, in international financial crises such as the global financial crisis or the Asian financial crisis, the role of private capital flows has been more prominent than it was during earlier crises, such as the Latin American debt crisis of the early 1980s. The coronavirus pandemic and the war in Ukraine are not shocks originating in the financial sector, but it can still act as a key transmission mechanism. The exchange rate can also play a role in the transmission of shocks and Okot and Kaltenbrunner (forthcoming a)

show that financial integration is one of the determinants of exchange rates in African countries. Against this background, understanding financial interlinkages between economies is important.

In this analysis, we look at financial integration, which is defined as the sum of external assets and liabilities divided by gross domestic product (GDP). If a country has a large stock of external assets and liabilities relative to the size of its economy, it is deemed to be highly financially integrated with the rest of the world. As Obstfeld (2012) argues, the size of the international balance sheet, as captured by the financial integration metric, is likely to reflect the potential for the transmission of external shocks to affect national economies. The most well-known metric for international financial balance sheets is the net international investment position, which subtracts external liabilities from external assets to give a country's position as an external creditor or debtor. It is a metric that is useful in understanding the sustainability of the external position. However, a country may have a small net position if large assets and liabilities are offsetting each other, meaning that the financial integration metric is also needed to understand the magnitude of the external sector.

A significant increase in financial integration has been evident across all regions in Africa since 2010 (Figure 1). West Africa has the lowest level of financial integration at 76% of GDP in 2019.[1] Financial integration is at 105% of GDP in East Africa and 114% in Central Africa and lags behind other developing regions. For example, financial integration for a wide selection of South American countries averaged 163% in 2019, while it stood at 176% for East and Southeast Asia. At the other end of the spectrum, financial integration in the region of Southern Africa dwarfs that of other regions at nearly 400% of GDP. The high levels of financial integration in the region of Southern Africa reflect the depth of financial markets in South Africa and the emergence of Mauritius as a financial services hub. The increase in financial integration across Africa in general since 2010 contrasts with a reduction in financial integration in advanced countries, mainly due to a retrenchment in cross-border lending by advanced-country banks following the global financial crisis (Lane and Milesi-Ferretti, 2017). Thus, while there was a reduction in financial integration between advanced countries, sub-Saharan Africa continued to see inflows from advanced countries.

Figure 1. Financial integration by region (% of GDP)

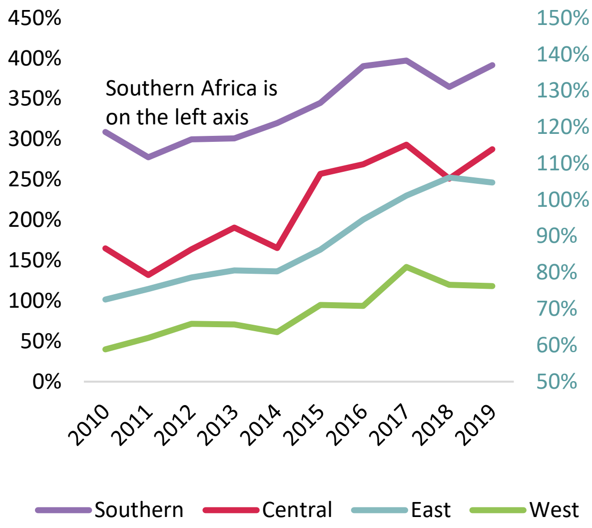
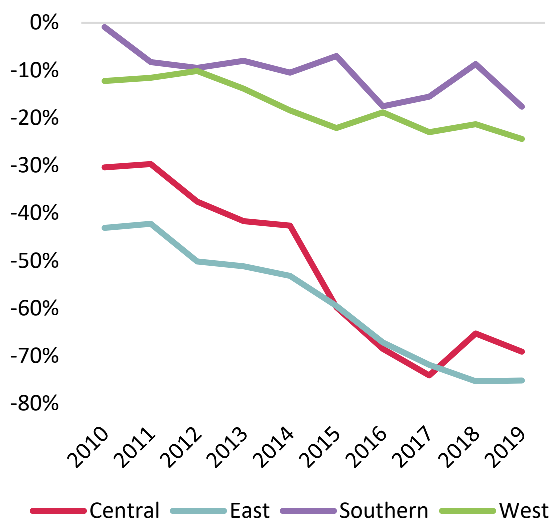


Figure 2. Net international investment position by region (% of GDP)



Sources: External Wealth of Nations, authors' calculations.

The increase in financial integration in Africa was accompanied by a deterioration in the net international investment position in each region (Figure 2), as growth in external assets failed to match growth in external liabilities. Central and East Africa have the largest net external liabilities, which could lead to problems servicing debt for some countries in the event of an exchange rate depreciation. West and Southern Africa have broadly similar net international investment positions, despite being at the opposite ends of the scale in terms of their

[1] All measures of African regional financial integration used in the chapter are GDP-weighted based on the countries in the region.

financial integration. Southern Africa benefits from having deeper financial markets than West Africa, but there is an attendant increase in risk because the large magnitude of the external sector means that a reversal in financial flows could potentially be more damaging to the region.

Changing structure of external liabilities

The risk associated with large external liabilities depends not only on the magnitude of those liabilities but also their composition. Decades ago, many African countries ran into trouble by accumulating large amounts of external debt. Indeed, external debt is still the largest source of financing in Africa as a whole (see Box 2 at the end of the chapter for more details). But since 2008, both equity and debt have played an important role in increasing external liabilities (Figure 3). Accordingly, the continent's story has been more positive, as this has also entailed investment in local enterprises by external investors rather than just the accumulation of external debt, although the importance of the increase in equity liabilities does vary considerably across regions. While the equity measure used in the chart below includes both foreign direct investment (FDI), which requires a foreign entity to buy at least a 10% share in a local enterprise, and portfolio equity liabilities, which amounts to foreign ownership of portfolio equity securities, it is heavily weighted to FDI in practice. As of 2019, FDI liabilities account for more than 95% of all equity liabilities in Central, East and West Africa and for about 75% in Southern Africa. Increased equity participation in local markets is seen as promoting international risk sharing, and FDI flows are considered a stable source of financing. Of course, the renewed concern given the outbreak of war in Ukraine is where foreign direct investment is coming from and whether African countries might suffer if their main FDI investors are impacted by the war. Box 1 in this chapter explores this issue for Africa.

Figure 3. Increase in equity and liabilities between 2008 and 2019 (% of GDP)



Sources: External Wealth of Nations, authors' calculations.

In contrast to foreign direct investment, portfolio liabilities are considered riskier because there is greater potential for capital flight during periods of heightened risk aversion. Total portfolio liabilities, comprising both equity and debt liabilities, accounted for less than 5% of GDP in East and Central Africa in 2019. For West Africa, the share rose to almost 10% in 2019, from about 5% of GDP in 2016.[2] To put this in context, the ratio is 22% in

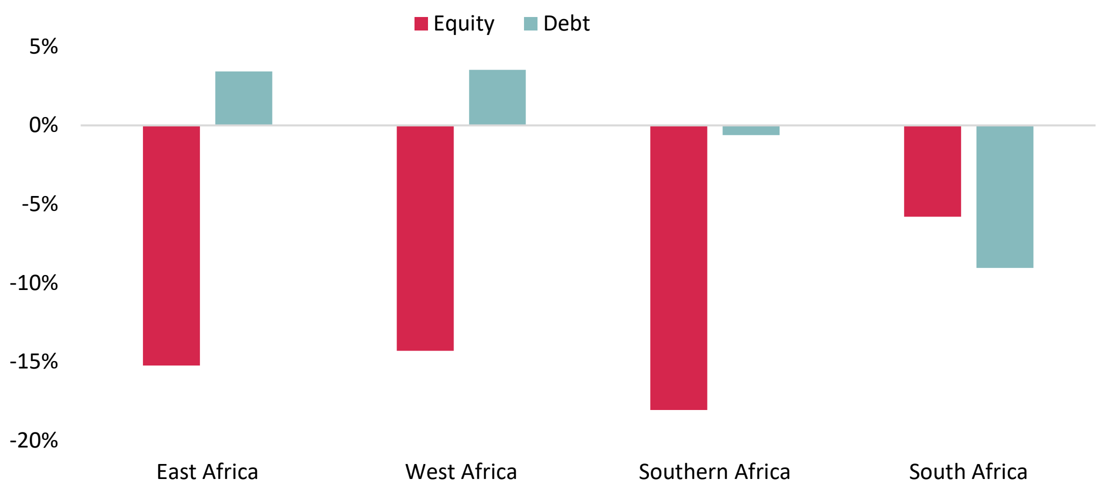
[2] Note that West Africa is also the region with the largest current account deficits. For example, the IMF is estimating current account deficits of 17% for Sierra Leone, 16% for Liberia and 13% for Senegal for 2022. While Southern Africa is the region where a majority of countries are in surplus on the external accounts, the current account balance has deteriorated between 2016 and 2020 in Botswana (8 percentage points of GDP), Mauritius (-7 percentage points) and Madagascar (-6 percentage points), so there are also countries where the risk of a sudden stop in flows has potentially greater consequences.

East/Southeast Asia and 23% in South America, meaning Africa attracts significantly less of this type of financing. Southern Africa is again the exception, with portfolio liabilities at 54% of GDP for 2019. Portfolio debt liabilities dominate most regions, accounting for more than 90% of portfolio liabilities in Central and West Africa and more than 70% in East Africa. This drops to 38% in Southern Africa, where equities are more important.

Calderon et al. (2019) find that financial flows to sub-Saharan Africa tend to be heavily influenced by global factors such as global growth, global economic and monetary policy and uncertainty in global financial markets. Ndiweni and Bonga-Bonga (2021) find a role for domestic growth too, as long as a minimum level of institutional quality has been exceeded. The current period is one of high uncertainty in global markets, with the impact of the war in Ukraine being felt just as countries are trying to recover from the pandemic. It is possible to review past shocks to see how financial flows in Africa have reacted in times of global crisis. Following the global financial crisis, portfolio equity liabilities exhibited greater outflows in sub-Saharan Africa compared to portfolio debt liabilities, and this was typical of all regions. Outflows during the taper tantrum[3] were more targeted regionally, with significant equity outflows from Central and Western Africa, whereas Southern Africa managed to record equity inflows.

The pandemic prompted portfolio outflows in sub-Saharan Africa that were concentrated on equity rather than debt. The data set has portfolio flow data for 2020 for some, but not all, countries. There are four countries with data for West Africa and six for East Africa. There are only two for Central Africa, and those countries have negligible portfolio liabilities, so we do not quote results for that region. As Southern Africa has the richest data, with availability for eight countries plus South Africa, we split the region between South Africa and the remainder of Southern Africa. Compared to 2019, portfolio equity liabilities in 2020 fell by 18% in Southern Africa (excluding South Africa), 15% in East Africa and 14% in West Africa, showing consistent outflows across the continent due to the pandemic (Figure 4).[4] South Africa saw smaller equity outflows of just 6%, but it also experienced portfolio debt liability outflows of 9%. In this sense, the aggregate outflows were similar in magnitude to other regions but distributed differently. The available data therefore support the idea that global risk-off periods impact sub-Saharan African portfolio flows. Moreover, equity portfolio liabilities in sub-Saharan Africa appear more sensitive than debt portfolio liabilities to global risk sentiment and are a transmission channel for global shocks such as the pandemic and the war in Ukraine. On the plus side, portfolio debt liabilities, which are more important for sub-Saharan Africa, showed resilience.

Figure 4. Change in portfolio liabilities between 2019 and 2020 (in %)



Sources: External Wealth of Nations, authors' calculations.

[3] The taper tantrum refers to the rise in sovereign bond yields that happened in 2013 when the US Federal Reserve announced that it would reduce (or taper) asset purchases. The Fed had already tripled its balance sheet in size following the global financial crisis, and the prospect of reduced policy accommodation was a negative shock to policy expectations.

[4] Portfolio liabilities are measured in nominal terms, so the change in liabilities could be due to either price effects (change in the value of stock markets) or quantity effects (flows). However, as quoted later in the chapter, when equity markets are discussed, stock prices were relatively flat in Africa in 2020, so for the sake of simplicity, any changes are attributed to flows.

Growth in external assets

Southern Africa has seen an increased preference for equity assets, while debt is the preferred asset in other regions. So far, we have focused mainly on the liability side, which shows how foreigners are purchasing domestic assets, thereby creating external liabilities for domestic residents. However, the asset side of the external balance sheet has also grown in sub-Saharan Africa, albeit more slowly than liabilities, as noted earlier. The more interesting story has been the change in the composition of assets over time. In Southern Africa, equity assets have trended upward over time and stood at 66% of total assets in 2019 (Figure 5). In contrast, debt assets were 23% of the total and the remaining 12% were accounted for by reserves. The predominance of external equity assets highlights the deeper and more mature nature of financial markets in South Africa and Mauritius. Outside Southern Africa, debt accounts for the largest share of assets, probably reflecting the desire to hold safe assets issued by advanced countries following the global financial crisis (Figure 6). Indeed, the share of debt assets had been declining until the global financial crisis, while that of reserves was increasing. In the early 1990s, reserves were as low as 20% of total assets, while by 2019 their share stood at 35%, having peaked at 56% before the global financial crisis. The preference to hold reserves is linked to the exchange rate regime in a country, as those with fixed or pegged exchange rates generally need to maintain a larger stock of reserves. The small share of equity asset holdings outside of Southern Africa reveals that the continent does not have a very large market of firms taking equity positions abroad (see Box 1 for more details).

Figure 5. Share of total assets by type, Southern Africa (in %)

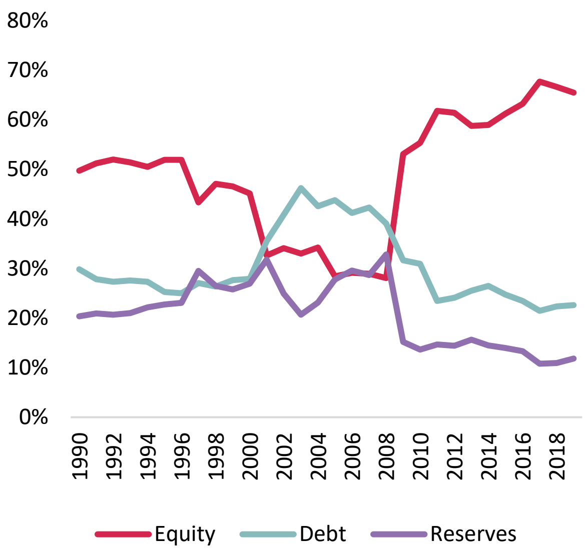
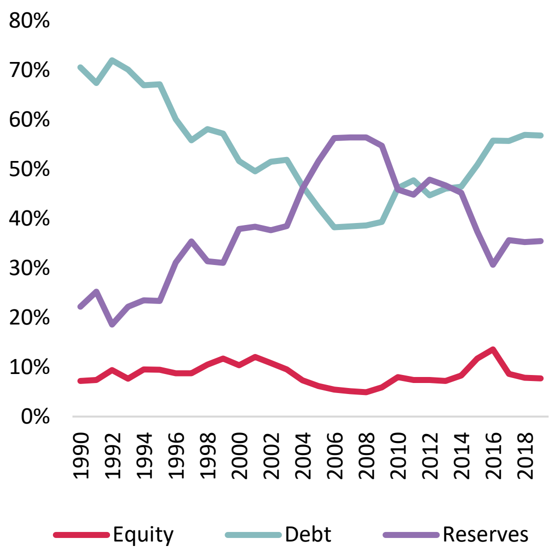


Figure 6. Share of total assets by type, other regions combined (in %)



Sources: External Wealth of Nations, authors' calculations.

Box 1: Foreign direct investment by country of inward investment

European countries are the largest source of foreign direct investment in Africa. In contrast, investment flows between Africa countries are small. This means that European investment in Africa has been an important driver of financial integration across Africa. Comprehensive data on the countries investing in Africa are not freely available, but the IMF has data for a limited sample of countries on the continent. Here, we present results on the largest sources of foreign direct investment for Benin, Botswana, Côte d'Ivoire, Namibia, Niger, Nigeria, Rwanda, South Africa and Zambia, which should still point to the continental trends. As South Africa and Nigeria dominate in terms of size, we present a table with key FDI sources for all countries before commenting on some aggregate statistics. The table shows the total stock of foreign direct investments as a share of GDP and how much of that has come from the five largest investor countries.

Table 1. Foreign direct investment by country of inward investment, stocks at end-2020

Benin	22%	%GDP	Botswana	38%	%GDP	Ivory Coast	20%	%GDP	Niger	66%	%GDP
France	36%		United Kingdom	48%		France	21%		China	58%	
India	12%		South Africa	28%		Canada	10%		France	25%	
Nigeria	11%	% FDI	Cayman Islands	5%	% FDI	United Kindom	8%	% FDI	Turkey	3%	% FDI
China	10%		Colombia	2%		Morocco	7%		United Kingdom	3%	
Côte d´Ivoire	6%		Sweden	2%		Mauritius	6%		Algeria	2%	
Total top 5	75%		Total top 5	85%		Total top 5	52%		Total top 5	90%	

Nigeria	17%	%GDP	Rwanda	26%	%GDP	South Africa	40%	%GDP	Zambia	104%	%GDP
Netherlands, The	18%		Mauritius	36%		United Kingdom	31%		Switzerland	22%	
United States	13%		Kenya	9%		Netherlands, The	19%		Canada	21%	
France	12%	% FDI	South Africa	7%	% FDI	Belgium	10%	% FDI	South Africa	10%	% FDI
United Kingdom	11%		United States	4%		United States	7%		China	9%	
Bermuda	10%		Netherlands, The	4%		Germany	5%		Netherlands, The	7%	
Total top 5	64%		Total top 5	61%		Total top 5	73%		Total top 5	70%	

Source: IMF Coordinated Direct Investment Survey.
Note: Percentages in yellow are FDI stocks as a % of GDP, while the percentages in blue are the share of FDI from main source countries.

The top five countries represent 70% of the total stock of foreign direct investment in the recipient African economies. The importance of the top five investors ranges from 52% of FDI in Côte d'Ivoire to 90% in Niger, but most countries are close to the average. This shows that foreign direct investment tends to be heavily concentrated in a small group of investor countries. The European countries in the top five account for more than 50% of such investment in the African countries in the sample — the share would rise if we also considered European countries outside the top five. While the war might curtail the overseas investment appetite of some European firms, African investment could prove more resilient given the need to find alternative sources of commodities.

The United States accounts for 7% of foreign direct investment, while China accounts for 2.8%. Chinese investment in Africa has primarily taken the form of loans, so the importance of China to African investment will not be captured here. However, another key feature of the data is that just 2.7% of foreign direct investment in Africa comes from other African countries, and just over half of that comes from South Africa. This shows that FDI flows between African countries are low given their common markets and geographical proximity. This dampens the transmission of African regional shocks but again increases exposure to global shocks. The OECD (2022) reports that Africa's participation in global value chains is very low compared to other developing regions, and several countries are mainly exporters of commodities rather than products higher up the value chain. If African countries started to trade more substantively with each other, it would likely increase intra-continental foreign direct investment. The recent signing of the African Continental Free Trade Agreement may entail a step in this direction.

Non-capital flows

While FDI flows to Africa have slowed, overseas development aid and remittances have mitigated the impact. The analysis in the chapter has so far focused on capital flows, meaning flows associated with a change in the ownership of an asset. However, there are other flows that are important for sub-Saharan Africa, including remittances and overseas development aid. World Bank data for sub-Saharan Africa as a whole show that while these three sources of flows were broadly equal until 2015, FDI flows have slowed since then. Investment in Africa was helped between 2012 and 2014 by solid GDP growth and high commodity prices, but from 2015, commodity prices began to fall, African growth slowed and foreign direct investment was subdued. In contrast, remittances and overseas development aid have generally remained more resilient (Figure 7).

Figure 7. Overseas development aid, foreign direct investment and remittances for Sub-Saharan Africa ($ billion)

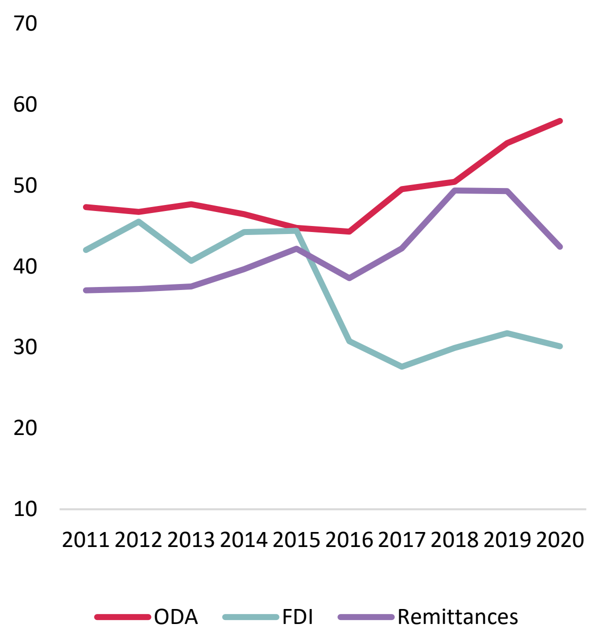
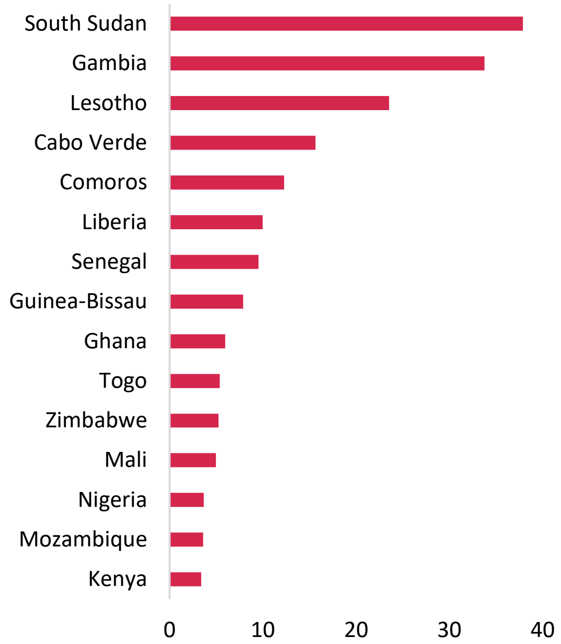


Figure 8. Remittances as a share of GDP in 2021 (in %, estimated)



Sources: World Bank World Development Indicators, authors' forecast for overseas development aid *for 2021, Knomad Database.*

Remittances are an important source of income for many countries in sub-Saharan Africa, with a particularly heavy reliance observed in South Sudan, The Gambia, Lesotho, Cabo Verde and Comoros (Figure 8). Of the countries for which data are available, there are 12 where remittances account for at least 5% of GDP. While remittances in Nigeria are estimated to account for 4% of GDP in 2021, they account for over 40% of total sub-Saharan African remittances, given the large size of the Nigerian economy.

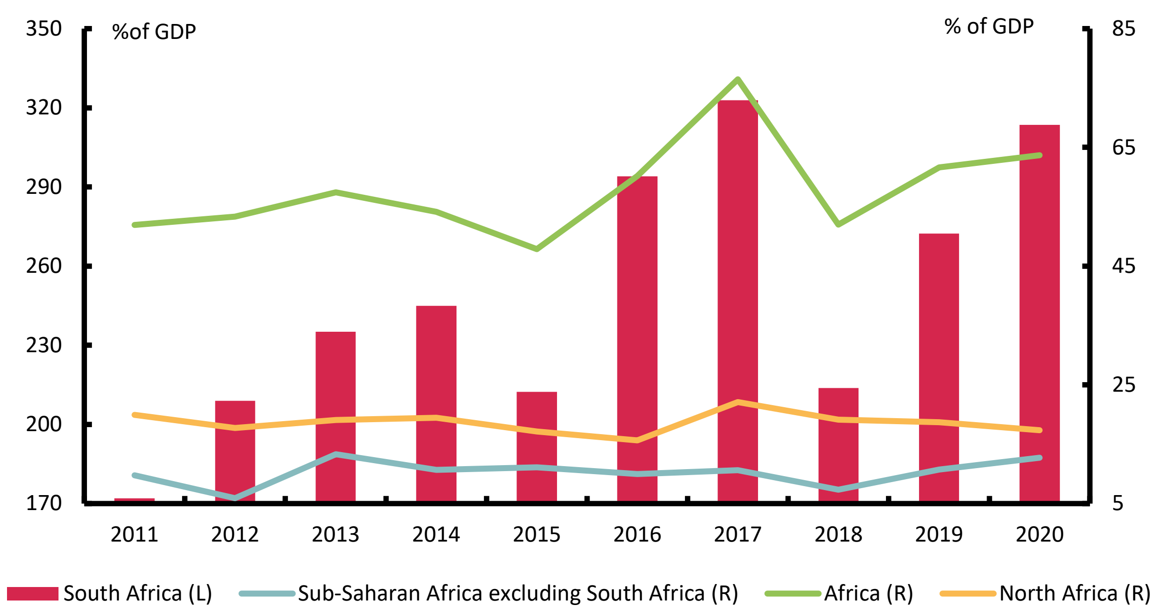
A sharp fall in Nigerian remittances clouds the picture for sub-Saharan Africa as whole, and remittances have remained an important and stable source of finance for many countries in the region. Total remittances fell by 14.1% in 2020 compared to 2019, with the pandemic as one of the contributory factors. Europe and Central Asia (-8.6%) was the only other region to see a significant fall in remittances, albeit less pronounced than in sub-Saharan Africa. However, the sub-Saharan Africa result was almost entirely driven by Nigeria, as remittances collapsed by an estimated 28% annually in 2020. Without Nigeria, remittances were broadly unchanged in 2020 in the rest of sub-Saharan Africa. For 2021, remittance growth in Nigeria increased by a meagre 2.5%, meaning remittances have remained far below pre-pandemic levels. For the remainder of the region, remittances grew by about 10% in 2021, putting them well ahead of pre-pandemic levels.[5] Thus, for many countries, remittance flows have remained an important and resilient source of income despite the aggregate number painting a gloomier picture. This is important when faced with another shock, like the war, as it suggests that remittances from higher-income regions could continue to act as a stabilising force. For a more detailed analysis of remittances in Africa, the European Investment Bank (EIB, 2020) examines the relationship between remittances, financial sector development, financial inclusion and investment.

[5] Remittance growth by region was positive in all emerging regions in 2021, so the remainder of sub-Saharan Africa is not an outlier in this regard.

Overview of stock markets in Africa

We now turn to domestic sources of financing, beginning with African capital markets. African capital markets are an important means of channelling private funds to the domestic economy, and finance investments contributing to inclusive economic growth. Yet the size and depth of African stock markets is dwarfed by that of other emerging markets. According to the World Federation of Exchanges, the average market capitalisation of listed companies in Africa stood at 63.6% of GDP in 2020, which compares to almost 100% of GDP in East Asia and the Pacific and 41% of GDP in high-income countries (Figure 9). Sub-Saharan Africa's stock market capitalisation stood at 86% of GDP, but when excluding South Africa, which has a market capitalisation above 300% of GDP, the market capitalisation drops to 12.7% of GDP. This compares to 17.4% in North Africa and is at the bottom of the global rankings.

Figure 9. Market capitalisation of listed domestic companies (% of GDP)



Sources: World Federation of Exchanges, World Bank, IMF and authors' calculations.

At the country level, stock market capitalisation is generally small compared to GDP, with some exceptions, notably South Africa. In North Africa, Morocco leads the stock market capitalisation in Maghreb ($65.6 billion, 57.1% of GDP), followed by Egypt ($41.4 billion, 11.3% of GDP) and Tunisia ($8.5 billion, 20.6% of GDP). In sub-Saharan Africa, South Africa has the highest market capitalisation ($1 trillion, 313.5% of GDP), followed by Nigeria ($56 billion, 12% of GDP), Kenya ($21.4 billion, 13.1% of GDP) and Ghana ($9.2 billion, 13.5% of GDP). The regional stock exchange, Bourse régionale des valeurs mobilières, spanning the eight country members of the West Africa Economic and Monetary Union (Benin, Burkina Faso, Guinea Bissau, Côte d'Ivoire, Mali, Niger and Senegal), has a stock market capitalisation ($7.3 billion, 4.8% of GDP) well above its peer exchange, the Bourse des valeurs mobilières de l'Afrique centrale ($432 million, 0.5% of GDP).[6] Most of the stock exchanges are in their early developmental stage, although some have been around for quite some time. A significant constraint of stock market development in Africa is the limited diversity of instruments available for trading and the very small number of listed stocks.

[6] The Bourse des valeurs mobilières de l'Afrique centrale covers the six countries of the Economic and Monetary Community of Central Africa (Cameroon, Central African Republic, Chad, Equatorial Guinea, Gabon and Republic of Congo).

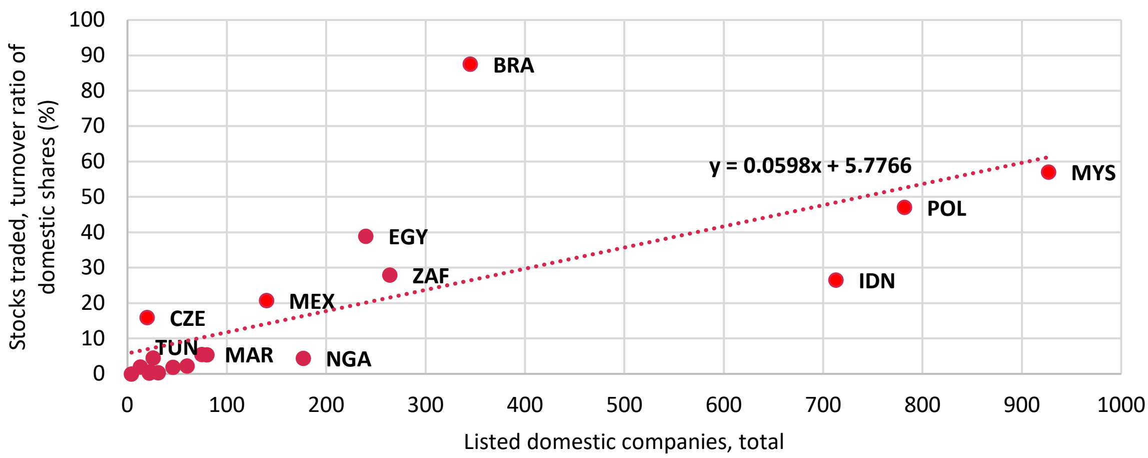
Figure 10. Market capitalisation of listed domestic companies (current $)



Sources: World Federation of Exchanges, World Bank, IMF and authors' calculations.

The number of listed companies in African stock exchanges is small. There were 1 251 companies listed on African stock exchanges in 2020 (latest data).[7] By comparison, there are 2 347 firms listed on the London Stock Exchange and 2 933 on the Nasdaq. Of the listed firms on the African stock exchanges, 397 are listed on North African stock exchanges and 854 on stock exchanges in sub-Saharan Africa. Once the companies listed on the Johannesburg Stock Exchange are excluded, the number of listed firms on sub-Saharan African stock exchanges drops to 523 firms. For example, on the Bourse régionale des valeurs mobilières, there are just 46 listed firms, and on the Bourse des valeurs mobilières de l'Afrique centrale, there are only four listed companies for all six countries of the Economic and Monetary Community of Central Africa.

Figure 11. Stock turnover and number of listed companies



Sources: World Federation of Exchanges, World Bank and authors' calculations.

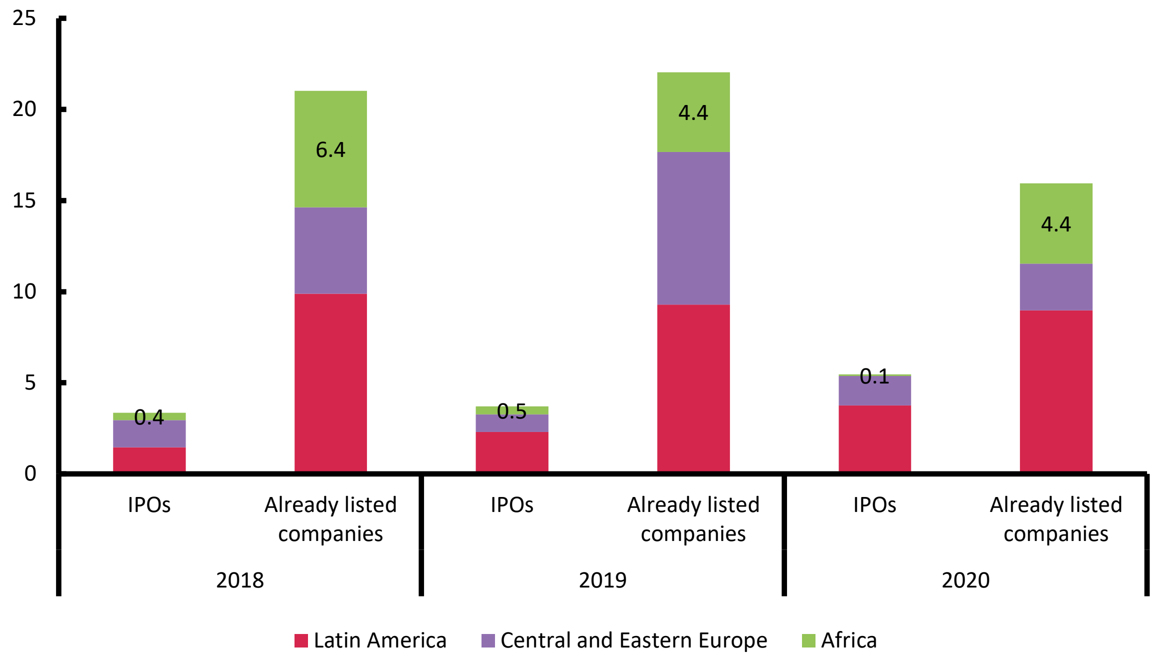
The low number of companies is combined with low stock turnover, which fuels volatility. Figure 11 shows most of the African stock exchanges are at the bottom left corner of the chart, signalling a low turnover ratio relative to other stock exchanges in emerging economies and a low number of listed companies. Specifically, the

[7] World Federation of Exchanges Annual Statistics Guide 2020.

turnover ratio, defined by the value[8] of domestic shares traded divided by their market capitalisation, indicates how easy, or difficult, it is to sell shares of a particular stock on the market. It compares the number of shares that changed hands during a particular period with the total number of shares that could have been traded during that same period. A low turnover ratio signals poor liquidity in the market, where small transaction volumes could impact the stock market price index and result in higher volatility.

Investment flows can find their way to the stock exchange either via new companies that want to become listed on the stock exchange via initial public offerings (IPOs) or already listed companies that want to issue more stocks in order to increase their capital. The investment flows that are channelled through African stock exchanges are mainly driven by the issuance of more shares by already listed companies, as the frequency of IPOs is very low compared to other developing peers. Investment flows from already listed companies in Africa fell in 2019 relative to the previous year and remained stable in 2020, but there was a sharp drop in IPO activity in 2020, something that also impacted the ability of private equity firms to exit investments (see the discussion of private equity later in the chapter). The performance of African stock exchanges was marginally negative in 2020 (-0.1% year-over-year) relative to Latin America (-8% year-over-year) and Asia (58% year-over-year). The portfolio equity outflows documented in the earlier part of the chapter will have contributed to the poor stock market performance in Africa relative to Asia or advanced markets, as reduced demand from overseas investors was met with a relatively steady domestic supply.

Figure 12. Investment flows channelled through exchanges ($ billion)



Sources: World Federation of Exchanges and authors' calculations.

Lengthy and binding administrative procedures for listing a company and high transaction fees impede the development of African stock exchanges (Soumaré et al., 2021). Transaction fees are considerably higher than in developed economies. Although there is a ceiling applied for fees applied to prospective companies that want to be listed on the London Stock Exchange, for example, in the Bourse régionale des valeurs mobilières and the Stock Exchange of Mauritius, the transaction fee is a percentage of the transaction value (except government securities in Mauritius). Technology can contribute to lowering transaction costs in many of these markets and speed up trading. Most of the African stock exchanges have already transitioned to automated trading systems.[9]

[8] The value is annualised by multiplying the monthly average by 12.
[9] The Botswana Stock Exchange introduced an automated trading system in August 2012 to increase transparency and efficiency in the trading of securities. Ghana has introduced an automated trading system and opens for continuous trading every working day from 10:00 to 15:00 Greenwich Mean Time. The Nairobi Securities Exchange has also changed its clearing and settlement procedure. The Nigerian Stock Exchange adopted the Nasdaq X-Stream trading platform in 2013.

Capital market depth and economic development

Stock markets support economic growth by enhancing the efficient allocation of savings, as more savings are channelled to the corporate sector and the financing of investment. Several studies have found a strong positive relationship between stock market development and economic growth in Africa. In the long run, a 1% increase in the liquidity rather than in the size of the stock market could account for up to 3.7 percentage points of African economic growth (Yartey and Adjasi, 2007). In the short term, there is evidence in favour of the finance-led growth hypothesis in countries like Egypt and South Africa (Enisan and Olufisayo, 2009). For Kenya, three out of five variables for capital market deepening have a significant positive relationship with GDP, implying that capital market deepening does indeed have a significant positive effect on economic growth in the country (Aduda et al., 2014). We calculate the depth of capital markets in Africa as the sum of the stock market capitalisation and the bond market capitalisation as a percentage of GDP for each country. Subsequently, we calculate the GDP-weighted sum for North Africa and sub-Saharan Africa (excluding South Africa). The capital market depth metric is then compared to GDP per capita (in current $) for each region.

Figure 13. Capital market depth and GDP per capita, North Africa

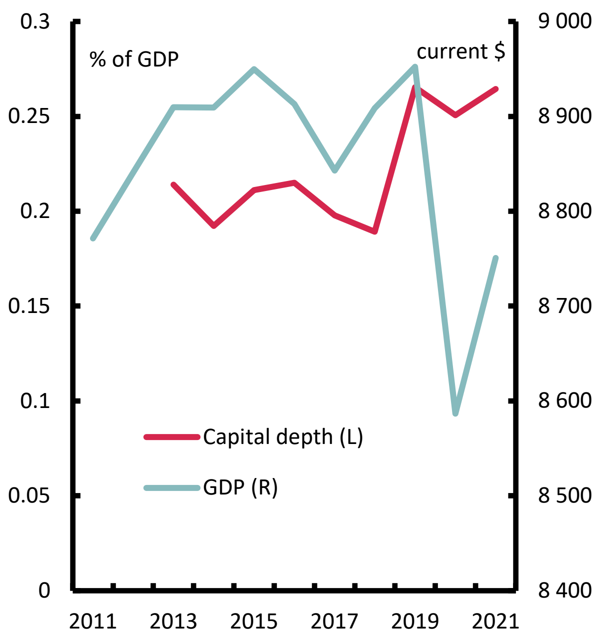
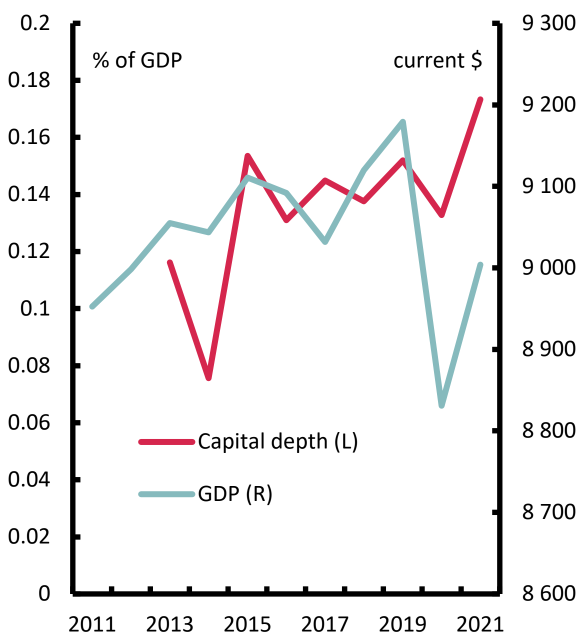


Figure 14. Capital market depth and GDP per capita, sub-Saharan Africa (excluding South Africa)



Sources: Bank for International Settlements, World Bank, IMF, World Federation of Exchanges and authors' calculations.

We observe that there is a close positive correlation between capital market depth and economic development, implying that an improvement in the capital market depth is associated with an increase in economic development. Table 2 below summarises the results of the econometric analysis performed on the impact of stock market capital depth on economic development proxied by per capita GDP in constant prices. The analysis accounts for other control variables proposed in the relevant literature, like international trade openness (defined by the sum of exports and imports as a percentage of GDP) and gross fixed capital formation as a percentage of GDP (Yartey and Adjasi, 2007; Elisan and Olufisayo, 2009; Aduda et al., 2014). According to the results of the analysis, an increase in the market capitalisation of listed companies results in a significant increase in economic development, signalling a strong causal link between stock market deepening and economic development at levels also cited in the literature.

Table 2. Econometric analysis on the link between stock market depth and economic development

Variables	(1) GDP	(2) GDP	(3) GDP	(4) GDP
Stocks	1.154***	0.155***	0.109***	0.105***
	(0.0155)	(0.0162)	(0.0163)	(0.0172)
Investment		-0.236		-0.831
		(0.548)		(0.432)
Trade			0.625***	0.692***
			(0.160)	(0.155)
Constant	8.932***	8.993***	8.492***	8.661***
	(0.0225)	(0.143)	(0.121)	(0.154)
Observations	93	93	93	93
R-squared	0.360	0.361	0.485	0.505
Region FE	YES	YES	YES	YES

Notes: Coefficient estimates from ordinary least squares *regression using regional/country fixed effects. Robust standard errors are reported in parentheses below the coefficient. The dependent variable* in *each column corresponds to the logarithm of real GDP per capita. Independent variables included stocks (stock market capitalisation of listed companies in % of GDP), investment (gross fixed capital formation in % of GDP) and trade (sum of international exports and imports in % of GDP). Annual country data were retrieved from the World Bank, the IMF and the Bank for International Settlements and spanned 1990-2020. Subsequently, GDP-weighted regional aggregates were constructed for North Africa,* sub-Saharan *Africa* (*excluding South Africa*) *and South Africa. Where data were unavailable, they were reconstructed by backward extrapolation. *** denote statistical significance at the 1% level.*

Reforms are necessary to enhance capital market depth. The reforms will have to focus on encouraging the development of a deep and broad investor base as well as increasing the participation of issuers of tradable securities in order to enhance the supply of and demand for capital, respectively (McKinsey & Company, 2017). In order to widen the investor base, policymakers could support the development of different categories of investors with a complementary role. These categories include buy and hold investors (insurance companies or pension funds), buy and trade investors (mutual funds), active investors (hedge funds) and private market investors (private equity or venture capital funds). As we note later in the chapter, private market investors have already played a demonstrable role in enhancing market depth.

The demand for capital could be further supported by privatising state-owned enterprises and promoting the development of fast-growing small companies. Financial intermediation should also be supported with reforms encouraging competition among market participants. Integrating local capital markets into global markets would help not only to diversify the sources of capital but also to expose the local capital markets to best market practices. Predictable enforcement and transparent regulatory and supervisory rules would further support the attractiveness of local capital markets. Improving the functioning of exchange rate mechanisms would also be a positive step in improving capital markets and increasing the attractiveness of inward investment; Okot et al. (forthcoming b) illustrate how both micro and macro factors can cause distortions in African foreign exchange markets.

Green financing in Africa

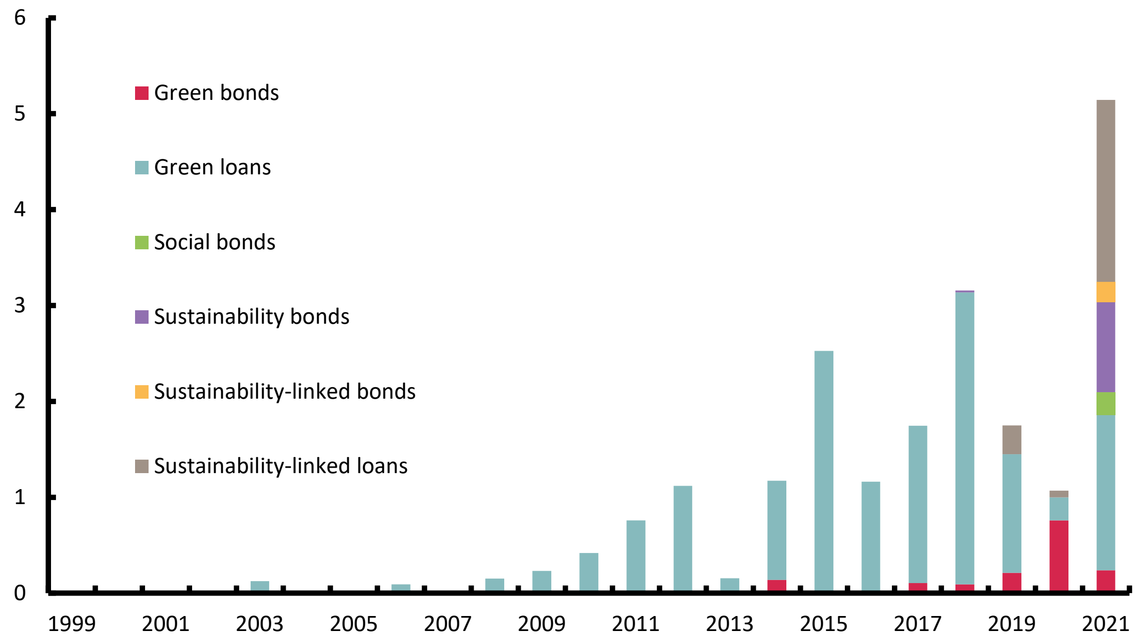
The investment needed to support climate change mitigation and adaptation could be partly financed through the issuance of green debt instruments. Issuance of environmental, social and governance (ESG) debt instruments by African issuers reached a historic high in 2021, with a significant increase in the issuance of

sustainability-linked loans and sustainability bonds. The sustainable debt labels as defined by Bloomberg are the following (although other labels exist):

- Green bonds/loans: Proceeds of the fixed income instrument will be applied towards green projects or activities that promote climate change mitigation or adaptation, or for other environmental sustainability purposes.
- Sustainability bonds: Proceeds will be applied towards projects that are dedicated to environmentally sustainable outcomes (a combination of green and social activities as eligible projects).
- Social bonds: Proceeds will be applied towards projects that directly promote improved social welfare and positive social impact for underprivileged, low-income, marginalised, excluded or disadvantaged populations.
- Sustainability-linked bonds (loans): Proceeds where the terms of a fixed income security (loan) are aligned with company's (issuer/borrower) performance against relevant predetermined sustainability targets in order to boost their sustainability profile.

The issuance of ESG bonds by African entities increased substantially to almost $5.1 billion in 2021, eclipsing the previous high of $3 billion set in 2018 before the pandemic, attesting to the growing demand for the asset class (Figure 15). The increase was the most pronounced for sustainability-linked loans and sustainability bonds, which stood at $1.9 billion and $0.9 billion, respectively, in 2021 after no issuances in the previous year. ESG finance in Africa before the coronavirus pandemic consisted exclusively of green loans. Nevertheless, the volume of green debt issuance by African issuers is dwarfed by that elsewhere in the world and in emerging markets. Global green debt issuance stood at $886 billion in 2020, up from $753 billion in the previous year, while green debt issuance from emerging markets stood at $157 billion in 2020, down from $232 billion in the previous year.

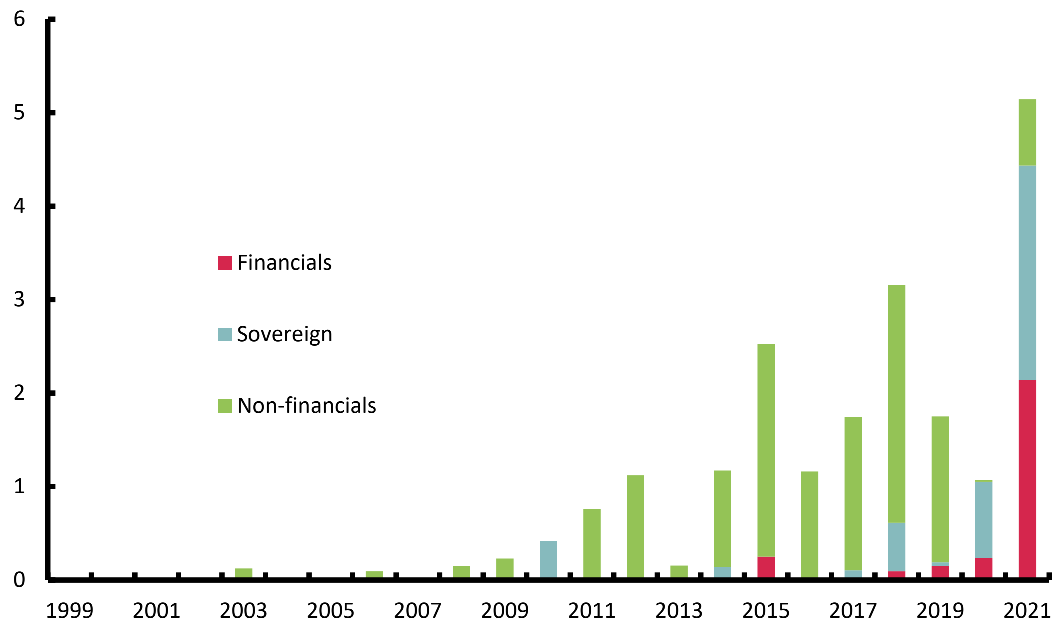
Figure 15. Environmental, social and governance finance in Africa by debt type ($ billion)



Sources: Bloomberg and authors' calculations.

Banks and sovereigns are the principal issuers of ESG financial instruments in Africa. Issuers of ESG finance debt instruments in Africa used to be mostly non-financial corporates and, to a lesser extent, sovereigns. However, there was a sharp increase in issuance by banks and sovereigns in 2021 (Figure 16), which might represent a turning point for green finance on the continent. However, issuance in 2021 may have been supported by buoyant global markets generally. With tougher market conditions prevailing in 2022, it may be a challenge to sustain this performance. Among African banks, sustainability-linked loans are the preferred debt instrument of issuance, while African sovereigns prefer sustainability bonds and non-financial corporates prefer green loans and sustainability-linked loans.

Figure 16. Environmental, social and governance finance in Africa by issuer type ($ billion)



Sources: Bloomberg and authors' calculations.

The improved standardisation of ESG debt instruments and the macroeconomic fundamentals of African issuers would underpin more funding of this kind. This standardisation could be facilitated by adopting principles similar to those of the European Green Bond Standard proposed by the European Commission on 6 July 2021. This aims to make the financial system more sustainable by creating a gold standard for green bonds that can be compared to, and potentially aligned with, other market standards. More generally, as discussed in Chapter 5, many banks also lack technical capacity when it comes to green issuance, so this is another hurdle in terms of expansion.

Green funding costs in Africa are inflated by high sovereign risk, which impacts lending terms for nearly all borrowers in the economy. This in turn lowers issuance volumes. As mentioned in Chapter 1, sovereign yield spreads are rising owing to deteriorating risk sentiment. Most African debt issuers are rated below investment grade by external rating agencies, which makes African green issuers reliant on demand from high-risk investors, which are more sensitive to changes in market sentiment.

The high level of sovereign risk in Africa is also compounded by high exposure to climate risk. A United Nations-backed analysis (Buhr et al., 2018) found that exposure to climate risks has increased the cost of debt for the Vulnerable Twenty countries (V20) by 117 basis points, on average.[10] In absolute terms, this translated into more than $40 billion in additional interest payments over the past ten years on government debt alone. In this sense, tackling climate change can also contribute to improved public debt sustainability.

Private equity and venture capital

Private capital is a growing segment of the financing landscape in Africa. EIB (2021) included a detailed overview of trends in private equity and venture capital until 2020. The main impacts of the pandemic were lower fundraising and reduced exit opportunities. With data now available for 2021, it is possible to see how private equity and venture capital in Africa fared in the second year after the outbreak of the pandemic. Data were again provided by the Global Private Capital Association (GPCA, formerly EMPEA), which provides data and intelligence on private capital flows across all emerging market regions.

[10] The V20 group refers to the countries that are members of the Climate Vulnerable Forum, which was established in 2009 as an international partnership of countries highly vulnerable to a warming planet.

Private capital fundraising is now back to pre-pandemic levels. African fundraising dropped sharply from $3.4 billion in 2019 to $2.4 billion in 2020 when the pandemic hit, as travel restrictions made it difficult to perform due diligence on the ground, especially for new fund managers. In 2021, there was a rebound in fundraising to $3.1 billion, meaning fundraising was broadly in line with the levels seen in the three years prior to the pandemic (Figure 17). Katz, S. (2022) reports that standard equity growth strategies accounted for about half of fundraising but that there is also growing interest in African infrastructure investment.

Figure 17. African private capital fundraising ($ billion)

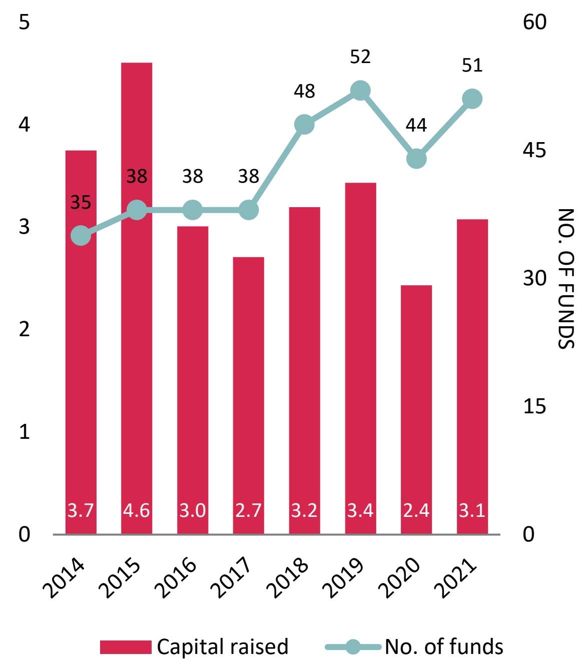
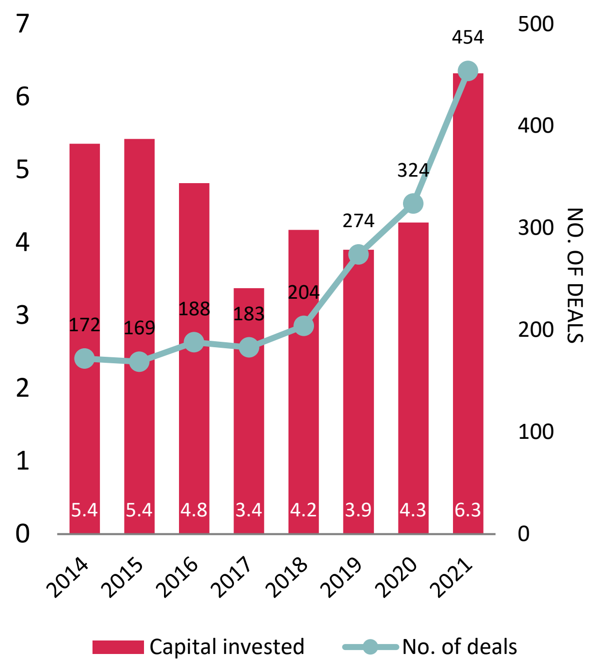


Figure 18. African private capital investment ($ billion)



Sources: Global Private Capital Association (GPCA, formerly EMPEA). Data as of 31 December 2021.

Private investment reached new highs in 2021. African private investment remained resilient in 2020 despite the pandemic, growing to $4.3 billion from $3.9 billion in 2019, as pipeline and existing deals were completed. In 2021, deal value grew again to $6.3 billion, representing an increase of 48% on 2020 (Figure 18). This surpassed the previous peak of $5.4 billion set in 2014/2015, when commodity prices were high and African growth was robust. The macroeconomic context in 2021 was also characterised by rising commodity prices and a rebound in growth following the economic slump in 2020, but the buoyancy in global markets, particularly global equity markets, no doubt contributed to the strong performance in African private investment in 2021. The reversal in risk appetite in 2022 means that this level of investment may be difficult to repeat.

The increase in investment in 2021 was driven largely by the venture capital side, which saw deal value increase from $485 million in 2020 to $3.23 billion in 2021, and roughly half of this investment was in FinTech (see Chapter 4 for more details). Investment in health had surged to $879 million in 2020, but this fell back to $226 million in 2021, although it was still twice as high as investment in 2018/2019. Investment in renewable energy fell from $767 million in 2019 to $398 million in 2020, but this rebounded to $674 million in 2021. The other industry segment to see a big increase in 2021 was consumer goods and services, which grew to $653 million from $345 million in 2020.

Nigeria was the largest market for private equity/venture capital investment in 2021, followed by South Africa (Figure 19). Together, they accounted for one-third of total investment. Given the dominance of FinTech in private equity/venture capital investment in 2021, Nigeria's position at the top of the table is not surprising. Nigeria is, in fact, characterised by a large population and low levels of financial inclusion, yet it has strong mobile phone penetration, all of which tend to encourage FinTech. Countries with deeper capital markets also support more private equity/venture capital activity. Consequently, private equity/venture capital activity is concentrated in the largest markets in Africa.

Figure 19. African private capital investment, 2021 ($ million)

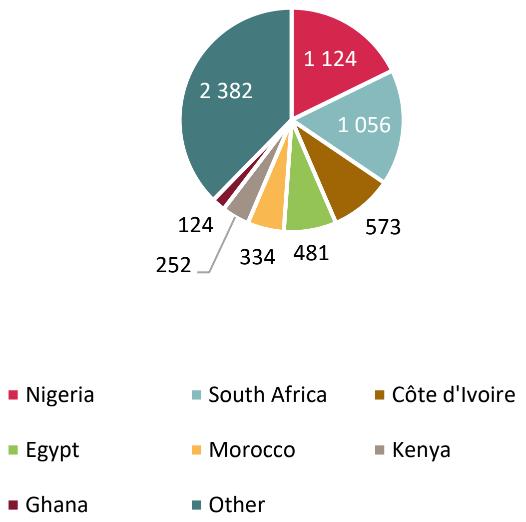
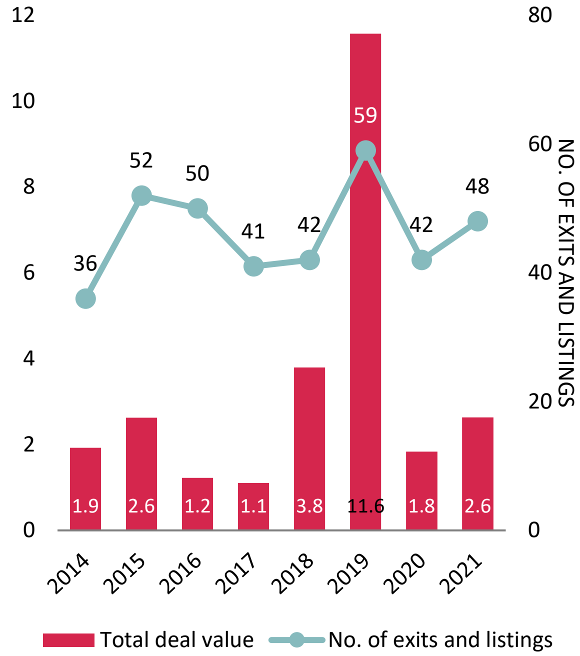


Figure 20: African exit values ($ billion), and number of exits



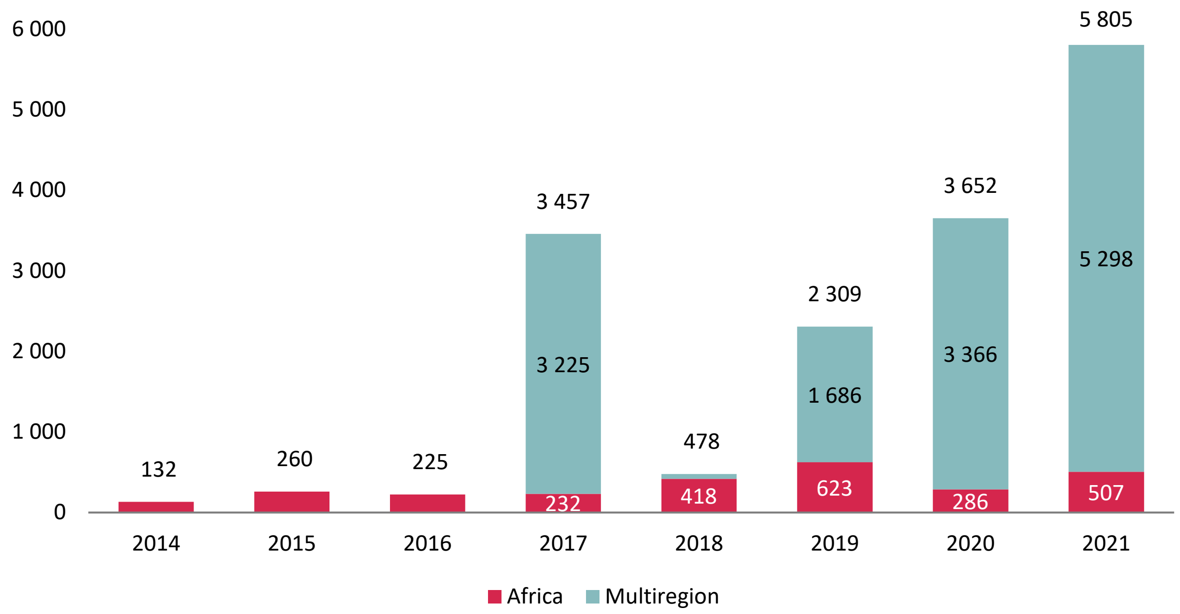
Sources: Global Private Capital Association (GPCA, formerly EMPEA). Data as of 31 December 2021.

Finding suitable exit opportunities for investments has been a consistent issue for African private equity firms. In 2020, exit opportunities dried up, with exit values falling to $1.8 billion from an unusually high $11.6 billion in 2019. There was a rebound in exits to $2.6 billion in 2021, which is still lower than 2018/2019 values but a significant improvement on 2020 (Figure 20). The most common ways for private equity firms to exit their investment in a target firm is to sell their stake to another player in the target firm's industry or to another private equity firm. In 2021, these types of sales accounted for two-thirds of exits, broadly unchanged from 2020. Public market listings increased from just one in 2020 to five in 2021, but as explained earlier in the chapter, local equity markets are illiquid, and this remains a barrier to exit for African private equity/venture capital firms.

The small size of public equity markets in Africa means that, despite the low number of public market exits by private equity firms, these exits are instrumental in deepening equity markets. Given the nature of the transactions, data are not always available for every public market exit, but there are some data to give a flavour of the activity. Egypt has been one of the most active markets. Four Egyptian private capital-backed companies listed on the Egyptian Exchange between 2015 and 2019 increased the market capitalisation of the domestic public stock market by about 2.5%, based on the increase in market capitalisation at the time of each transaction. However, there have been some big-ticket transactions in certain markets. The largest individual transaction was the $5.1 billion direct listing of MTN Nigeria Communications on the Nigerian Stock Exchange in 2019. The exchange had a total market capitalisation of approximately $44 billion, so the deal was equivalent to more than 10% of the market capitalisation. In Togo, an initial public offering for Oragroup (financial services) for $98 million in 2019 was an even bigger boost for the domestic exchange, which had a market capitalisation of $433 million. In light of the small size of public equity markets documented earlier in the chapter, private deals like this help support market development.

Private equity is also contributing to the growth of green financing. There has been a surge in fundraising for climate-focused investing in recent years, particularly when multiregion funds (those investing in Africa and other regions) are included. Total fundraising hit $5.8 billion in 2021, up from $3.6 billion the year before. Even if purely African-focused funds are considered, the $507 million fundraising in 2021 was the second largest on record after 2019 (Figure 21). This means that there are funds available to drive future investment growth in this segment. Like the public capital flows, Africa still represents a small share of the green private capital market, and continued support is needed by development banks and governments to further grow these financial flows.

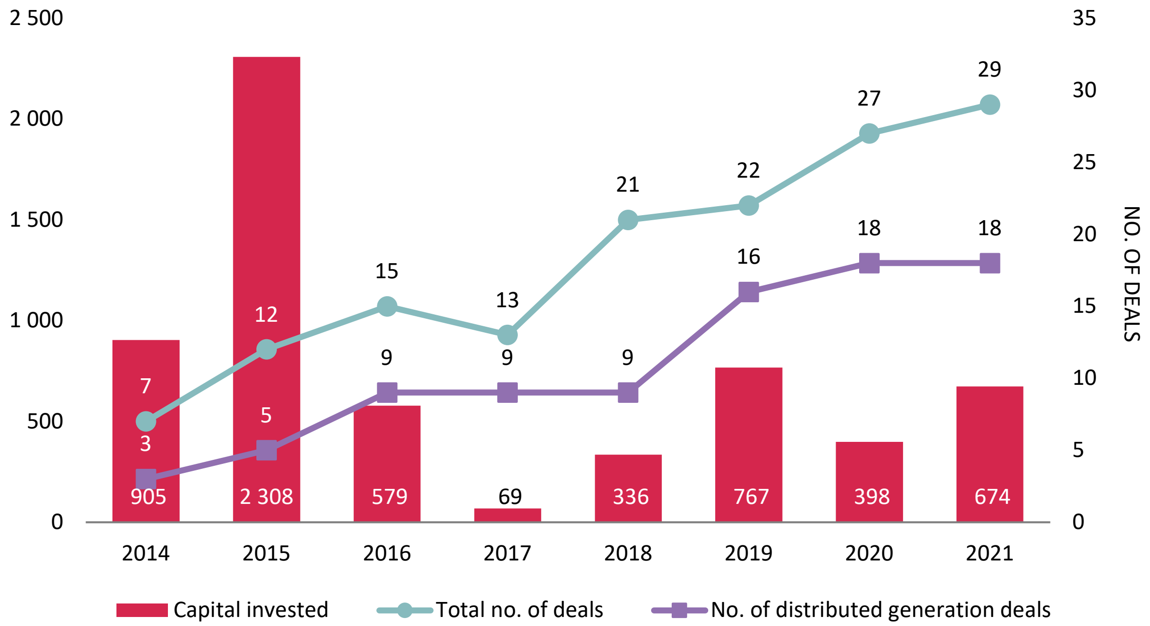
Figure 21. Fundraising for climate-focused vehicles investing in Africa, 2014–2021 ($ million)



Source: GPCA.

Private equity deal numbers for renewable energy investment have been on an upward trend in Africa, helped by continued improvement in distributed generation technology, which allows energy demands to be met in remote locations, as this has proved an attractive space for private deal making. However, the trend in deal numbers has not been matched by significant growth in deal value (Figure 22). Deal value in recent years remains below that seen in 2014/2015, when some large-scale projects pushed up deal value. Nonetheless, investment in green energy has been more than double that in conventional energy projects in the three years since 2019. The strong role that multinational development banks continue to play in supporting the private equity industry in Africa is likely contributing to this trend.

Figure 22. African renewable energy investment by private equity and venture capital firms ($ million)



Source: GPCA.

Box 2: The African Long-Term Finance Initiative

Trends in long-term finance in Africa

Africa's long-term finance landscape has evolved over time. The changing external sector, macroeconomic environment, regulatory frameworks and financial sector development are among the factors that have shaped the trends in long-term finance. Available data suggest that external debt is the predominant source of such finance on the continent, followed by domestic savings (Table 3). The need to build infrastructure investment on the back of constrained domestic resources has led to the rise of external debt as a source of development finance for long-term infrastructure investment.

Private credit dominates other banking sector indicators of long-term finance depth in Africa (Table 3), with the largest markets in Northern and Southern Africa. Interestingly, long-term financing has largely been used to service existing debts, with a smaller amount of the mobilised long-term funds being used to finance infrastructure development.

Macroeconomic instability has reduced the attractiveness of funding opportunities for investors. The enabling environment for long-term financing involves the business environment and other regulatory frameworks. The value of average inflation — a proxy for macroeconomic instability — suggests the continent broadly suffered from high inflation over the sample period and this inhibited the mobilisation of finance. Africa performs better on other metrics, however. Depth of credit information, protection of minority investors and enforcement of contracts have remained good, and there are opportunities for improvement.

The African long-term finance initiative

To improve long-term access to finance, the African Long-Term Finance Initiative (ALTFI) was launched in 2017 as a joint effort of the African Development Bank (AfDB), the Making Finance Work for Africa (MFW4A) Partnership, the Financial Sector Deepening (FSD) Africa and the German Development Cooperation (GIZ), with the aim of bridging infrastructure financing gaps by boosting long-term finance intermediation.

The ALTFI uses two instruments to analyse long-term finance markets. **First, the LTF Scoreboard provides rich data on the availability of long-term finance in Africa**. Despite the importance of long-term finance and the increased appetite for long-term infrastructure financing, there is a lack of transparent and reliable data on long-term finance, which inhibits opportunities for deepening it in Africa. The scoreboard therefore fills the gap for donors and the private sector to help guide decision-making. The scoreboard, which is publicly available, covers several indicators on the depth, sources, uses and enabling environment of long-term finance in Africa.[11]

In addition to the LTF Scoreboard, the second pillar for improving the understanding of long-term finance issues is country diagnostics, which provide critical in-depth analyses of the associated markets in Africa by considering the country-specific patterns, trends, opportunities and challenges in mobilising finance while offering key recommendations to support long-term finance intermediation. The diagnostics also provide critical analyses of the country's infrastructure, enterprise and housing finance. The ALTFI has so far undertaken three country diagnostics in Côte d'Ivoire, Ghana and Ethiopia.

A key finding emanating from the reports is that gaps in long-term financing are driven by marked maturity mismatches. Similar to infrastructure investments in other African economies, those in the sampled countries only attract funding of much shorter maturity than the assets being financed, which does not satisfy the investment needs. Given the lack of adequate long-term financing in Africa, a concerted effort to leverage both the public sector and the private sector, including donor resources, becomes imperative when mobilising existing domestic resources and creating new sources of finance.

[11] Details on the ALTFI can be found on the initiative's website, available at: https://altf.afdb.org/.

Table 3. Long-term finance in Africa (sources, depth, uses and enabling environment)

	Domestic:	Average		Investment:	Average
Sources	Population (in millions)	1 212.5	Uses	Gross fixed capital formation (% of GDP)	22.1
	GDP growth (%)	4.6		Infrastructure development index (0-100)	27.8
	GDP (in billions of current US Dollar)	2 362.7		Private participation in infrastructure (PPI) (% of GDP)	2
	Gross domestic savings (% of GDP)	18.8		Mortgage penetration (% of GDP)	4.7
	External:			Adults with loans for home purchase (% of population)	5.4
	Remittances inflow (% of GDP)	3.4		**Business:**	
	Foreign direct investment (FDI) (% of GDP)	2.1		Agricultural loans (% of the bank's total lending)	4.1
	Official development finance (ODF) (% of GDP)	2.4		Non-manufacturing loans (% of the bank's total lending)	31.5
	Cross-border lending (CBL) (% of GDP)	10.8		Manufacturing loans (% of the bank's total lending)	16.7
	External debt (% of GDP)	31.6		Services loans (% of the bank's total lending)	47.7
	Long-term external debt (% of external debt)	76.8		Firms using banks to finance investments (%)	15.2
	Private external debt (% of external debt)	23.3		Collateral-to-loan ratio (% of the loan amount)	8.8
Depth	**Banking:**		Enabling environment	**Business environment:**	
	Commercial banks' assets (% of GDP)	64.3		Inflation (%)	12.9
	Private credit (% of GDP)	43.3		Enforcing contracts index (0-100)	51.3
	Long-term credits (% of GDP)	7.1		Getting credit (0-100)	47
	Share of long-term credits (% of total banking system)	29.2		Protection of minority investors (0-100)	52.8
	Share of medium and long-term credits (% of total loans)	59.9		Strength of minority investor protection (0-100)	26.4
	Long-term deposits (% of GDP)	18.8		Depth of credit information (0-100)	63.6
	Share of long-term deposits (% of total banking system deposits)	50.2		Resolving insolvency (0-100)	33.6
	Institutional investors:			Registering property (0-100)	44.6
	Insurance companies' assets (% of GDP)	17.6		**Regulatory framework:**	
	Insurance companies' long-term assets (% of long-term assets)	59.8		Existence of property registry	
	Insurance penetration (% of GDP)	3.7		Auditing and accounting standards	
	Life insurance business (% of total insurance activity)	41.4		Existence and extent of guarantee schemes targeted at long-term finance	
	Life insurance penetration (% of GDP)	2.7		Restrictions on insurance companies' long-term investments	
	Leasing penetration (% of GDP)	3.2		Restrictions on pension funds' long-term investments	
	Pension funds' assets (% of GDP)	23.6		Existence of public-private partnership legislation	
	Capital markets:				
	Stock market capitalisation (% of GDP)	66.7			
	Stock market turnover (% of total equity market capitalisation)	4.8			

Source: African Long-Term Finance Initiative (ALTFI) Scoreboard.

There are considerable infrastructure finance gaps in Africa, inhibiting the achievement of the Sustainable Development Goals. The need to mobilise additional resources has brought to the fore the importance of obtaining long-term finance to enable more sustainable and inclusive development. While the role of long-term finance is well recognised, available data to track and monitor its various sources and uses are scant. The ALTFI was therefore launched to fill this gap and support intermediation.

References

Aduda, J., Chogii, R. and Murayi, M. T. (2014). "The effect of capital market deepening on economic growth in Kenya." *Journal of Applied Finance and Banking*, 4(1), pp. 141–159.

Agenor, P. R. (2003). "Benefits and costs of international financial integration: theory and facts." *The World Economy*, 26(8), pp. 1089-1118.

Buhr, B., Donovan, C., Kling, G., Lo, Y., Murinde, V., Pullin, N. and Volz, U. (2018). "Climate change and the cost of capital in developing countries." SOAS University of London.

Calderon, C., Chuhan-Pole, P. and Kubota, M. (2019). "Drivers of gross capital inflows: which factors are more important for Sub-Saharan Africa?" Policy Research Working Paper No. 8777. Washington, DC: World Bank. Available at: https://openknowledge.worldbank.org/handle/10986/31403.

EIB (2020). *Banking in Africa: financing transformation amid uncertainty*. Available at: https://www.eib.org/attachments/efs/economic_report_banking_africa_2020_en.pdf.

EIB (2021). *Finance in Africa: for green, smart and inclusive private sector development*. Available at: https://www.eib.org/en/publications/economic-report-finance-in-africa-green-smart-inclusive-private-sector-development.

Enisan, A. A., and Olufisayo, A. O. (2009). "Stock market development and economic growth: evidence from seven Sub-Saharan African countries." *Journal of Economics and Business*, 61(2), pp. 162–171.

IMF (2022). *Sub-Saharan Africa regional economic outlook*. Available at: https://www.imf.org/-/media/Files/Publications/REO/AFR/2022/April/English/text.ashx.

Katz, S. (2022). "African Data Insight." Global Private Capital Association. Available at: https://www.globalprivatecapital.org/research/2022-africa-data-insight/.

Lane, P. R. and Milesi-Ferretti, G. M. (2017). "International financial integration in the aftermath of the global financial crisis." IMF Working Paper No. 2017/115. Available at: https://www.imf.org/en/Publications/WP/Issues/2017/05/10/International-Financial-Integration-in-the-Aftermath-of-the-Global-Financial-Crisis-44906.

Lane, P. R. and Milesi-Ferretti, G. M. (2018). Database available at: https://www.brookings.edu/research/the-external-wealth-of-nations-database/#:~:text=The%20EWN%20provides%20estimates%20of,and%20its%20total%20external%20liabilities.

McKinsey & Company (2017). "Deepening capital markets in emerging economies." Banking and Finance, April. Available at: https://www.mckinsey.com/~/media/mckinsey/industries/financial%20services/our%20insights/deepening%20capital%20markets%20in%20emerging%20economies/deepening-capital-markets-in-emerging-economies.ashx.

Ndiweni, Z. L. and Bonga-Bonga, L. (2021). "Capital inflows and economic growth nexus in Sub-Saharan Africa: evidence on the role of institutions." University of Johannesburg, MPRA Paper No. 107392. Available at: https://mpra.ub.uni-muenchen.de/107392/.

Obstfeld, M. (1994). "The logic of currency crises." NBER Working Papers 4640. National Bureau of Economic Research, Massachusetts, United States.

Obstfeld, M. (2012). "Financial flows, financial crises, and global imbalances." Working Paper No. F-3004-NOC-1. Available at: https://www.theigc.org/wp-content/uploads/2012/03/Obstfeld-2012-Working-Paper.pdf.

OECD (2022). *Africa's development dynamics 2022: regional value chains for a sustainable recovery*. Available at: https://www.oecd.org/dev/africa-s-development-dynamics-3290877b-en.htm.

Okot, A. and Kaltenbrunner A. (forthcoming a). "Determinants of the Exchange Rate, its Volatility and Currency Crash Risk in African Low and Lower Middle-Income Countries."

Okot, A. and Kaltenbrunner A. (forthcoming b). "A Micro-Macro Structural Analysis of Foreign Exchange Markets in Sub-Saharan Africa."

Soumaré I., Kanga, D., Tyson J. and Raga, S. (2021). "Capital market development in Sub-Saharan Africa: Progress challenges and innovations." Working Paper 2, Overseas Development Institute.

United Nations (2020). *Economic report on Africa, innovative finance for private sector development in Africa.* Available at: https://www.un-ilibrary.org/content/books/9789210051248.

Yartey, C. A. and Adjasi, C. K. (2007). "Stock market development in sub-Saharan Africa: Critical issues and challenges." IMF Working Paper 07/209. Washington, DC: International Monetary Fund.

3

Banking sector, gender and microfinance institutions

This chapter is authored by Alfredo Baldini, Colin Bermingham, Claudio Cali, Emmanouil Davradakis, Kevin Koerner, Francesca Mameri, Carmen Niethammer, Ricardo Santos and Sanne Zwart, all staff of the European Investment Bank. The chapter benefits from the contribution of a box on crowding out by Sanne Zwart, one of the authors of Attout et al. (2022), a paper that is co-authored by the European Investment Bank and the African Development Bank, and a box on financing constraints facing firms from Frank Betz of the EIB. The authors also acknowledge Lucia Spaggiari of MicroFinanza Ratings, who kindly assisted with the preparation of the section on microfinance institutions.

The authors would like to thank Mihaljek Dubravko, Barbara Marchitto and Debora Revoltella for their comments on earlier versions.

Key messages

The EIB Banking in Africa survey for 2022 shows that following the outbreak of the war in Ukraine, the main concerns for banks are the cost of local currency funding, competition from the non-banking sector and deteriorating asset quality. Last year, following the onset of the pandemic, banks were chiefly worried about asset quality, and had little concern about local currency funding costs. However, with central banks in many countries raising domestic interest rates and bond funding becoming more expensive due to tighter global financial conditions, there has been a significant increase in banks worried about funding costs.

The reduction in asset quality to date is worse for small and medium-sized business portfolios than for large corporates. In addition, headline non-performing loan (NPL) figures do not tell the whole story — there are significant shares of loans under moratoriums or restructuring. Banks' concerns about asset quality suggest that higher non-performing loans are likely in some countries as support measures are wound down and tough global economic conditions persist. Banks plan to tighten lending standards for a third consecutive year in 2022. Lack of collateral and poor credit history are key barriers to finance, especially for small and medium-sized enterprises (SMEs). These factors repeatedly feature in our survey, suggesting they are structural problems, although they may be aggravated by cyclical factors.

Banks expect to see increased credit demand, and they also plan to expand their own operations, which will in turn require an expansion of their funding. The share of banks planning to expand lending operations is somewhat higher in the 2022 survey compared to 2021. Despite clear concerns about asset quality, the mood that seems to characterise the sector is therefore one of cautious optimism.

Banks across the region are stepping up efforts to increase access to finance for women. 70% of the banks surveyed have a gender strategy in place and sponsor women- and gender-focused initiatives in the community, an increase of 10 percentage points on the share in the 2021 survey. The 2022 Banking in Africa survey dispels any remaining misconceptions related to women and asset quality. In fact, almost 30% of banks surveyed observed no differences in default and NPL rates between male and female portfolios, and four in ten banks found that NPL rates for women-led businesses were lower than the average NPL rate of their loan portfolios. Only 3.7% of respondents said the NPL rate was higher for women-led businesses while the remaining banks either did not respond or did not know.

Microfinance institutions (MFIs) in sub-Saharan Africa saw cumulative growth of about 30% in their loan portfolios between 2019 and 2021, meaning growth has been faster there than in other parts of the world. However, asset quality issues remain, and some institutions have low capitalisation. The solvency concerns are greatest for smaller microfinance institutions, as they have a higher share of problem loans. However, these are also the institutions that have a greater share of rural and female borrowers. Their failure would therefore reverse many gains made in financial inclusion over the last decade.

Introduction

The European Investment Bank surveyed[1] 70 banks from a sample of 339 banks in sub-Saharan Africa in 2022, supported by Making Finance Work for Africa.[2] The banks that participated in the European Investment Bank's Banking in Africa survey account for approximately 30% of the continent's assets. Therefore, although the results of the survey cannot claim to be fully representative, they provide valuable insights into the financial sector in sub-Saharan Africa, as perceived by its banks. The survey was carried out between April and June 2022, meaning that the impact of the war in Ukraine had already begun to shape banks' perceptions. This chapter will focus on the lingering impact that the pandemic is having on banks and the challenges that they see ahead following the outbreak of the war. The analysis aims to understand how well banks are equipped to support the private sector, especially small and medium firms, in circumstances that remain challenging. The chapter includes analysis of banking trends at regional level for different parts of sub-Saharan Africa. It also contains an overview of gender-based lending policies in sub-Saharan Africa and an analysis of lending and solvency trends in microfinance institutions. In the chapter on digital financial services, the survey results are used to help understand the burgeoning FinTech scene and how banks in sub-Saharan Africa are responding to climate change.

Table 1. Key banking sector indicators, African sub-regions

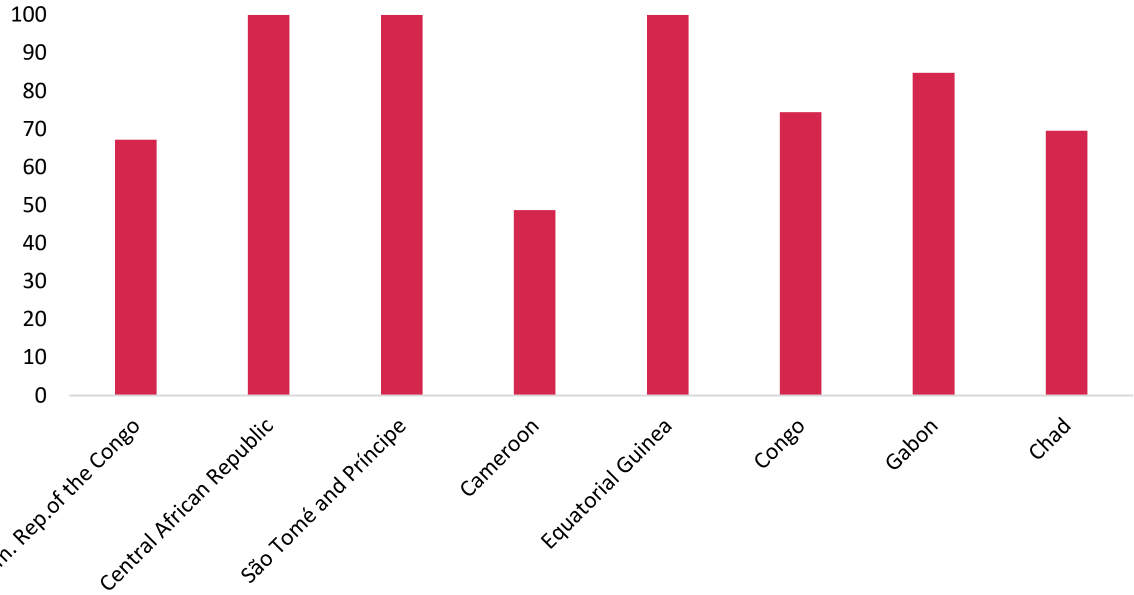
Region	Number of banks	Banking concentration (top 3 banks)	Credit to the private sector (% of GDP)	Annual credit growth (%)	Loan to deposits	Non-performing loans (% of total loans)	Capital to risk-weighted assets (RWA) (%)	Return on equity (%)
Southern Africa	204	61.68	79.99	26.41	81.44	7.86	18.56	16.07
West Africa	221	47.81	14.79	15.15	62.39	8.79	15.85	15.44
East Africa	171	54.14	22.98	12.10	71.65	7.71	18.79	18.62
Central Africa	46	68.11	11.48	6.48	71.31	18.93	12.60	12.89
Sub-Saharan Africa	**642**	**55.43**	**38.21**	**17.69**	**71.33**	**9.15**	**17.03**	**16.01**

Sources: IMF Financial Soundness Indicators, available at: https://data.imf.org/?sk=51B096FA-2CD2-40C2-8D09-0699CC1764DA&sId=1390030341854; World Bank Databank, available at: https://data.worldbank.org/indicator/FS.AST.PRVT.GD.ZS?locations=ZG&name_desc=false; Moody's Analytics BankFocus data (combines content from Bureau van Dijk and Moody's Investors Service, with expertise from Moody's Analytics), available to subscribers at https://login.bvdinfo.com/R0/BankFocus.
Note: GDP-weighted averages.

Banking sector concentration generally tends to be high in sub-Saharan Africa. Key descriptive indicators are provided in Table 1 based on data from the International Monetary Fund (IMF), the World Bank and Moody's Analytics BankFocus. As of 2021, there were 642 banks operating in sub-Saharan Africa: 221 in West Africa, 204 in Southern Africa, 171 in East Africa and 46 in Central Africa.[3] Concentration tends to be high in sub-Saharan African banking systems, and the share of assets held by the three largest banks ranges from 47% in West Africa to 68% in Central Africa; the average for emerging and developing economies generally is close to 60%. However, in most regions, banking sector competition is more intense in the larger countries, meaning competition can be much weaker in small countries than the regional average. For example, in Central Africa, Cameroon accounts for 28% of regional gross domestic product (GDP), and the asset concentration of the three largest banks is 48%. This means that many of the smaller countries in the Central Africa region have asset concentrations well above the 68% regional average (Figure 1).

[1] This survey was administered online. Response rates did not differ significantly by sub-region, although the smaller number of responding banks (six) in the Central African sub-region means that data for that sub-region should be interpreted with caution.
[2] The survey was carried out only in sub-Saharan Africa. The only banks included from North Africa were those with a pan-African presence.
[3] As the analysis focuses on bank lending to private sector firms, the following types of institutions were excluded: central banks, development institutions, microfinance institutions, mortgage banks, savings banks, investment banks, private banking/asset management companies, finance companies, non-banking credit institutions, securities firms, clearing institutions and investment and trust corporations.

Figure 1. Banking concentration of the top three banks in Central Africa (% of total assets)



Source: Moody's Analytics BankFocus.

Banking activity in sub-Saharan African countries remains small relative to the size of the economy, even when compared to peers in other developing economies. Looking at the asset size of deposit-taking institutions (as a share of GDP), about two-thirds of the countries in the bottom quartile of the distribution are in sub-Saharan Africa. Taking a regional approach, World Bank data also show that credit to the private sector is 38.9% of GDP in sub-Saharan Africa compared to 59.6% in Latin America and the Caribbean or 172% in East Asia and the Pacific. The small size of the banking sector in sub-Saharan Africa reflects several factors. First, low income levels curtail the amount of credit that can be extended in the economy. Second, as shown in Chapter 1, financial integration with the rest of the world and trade flows in sub-Saharan Africa are also low relative to other developing regions, and this is also likely to weigh on the level of financial intermediation. Third, several studies (such as Cherif and Dreger, 2016) have found that weak institutional quality is also a potential factor restricting financial sector development and institutional quality in sub-Saharan Africa, as measured by the World Bank Worldwide Governance Indicators, and it tends to lag behind other developing regions.

Figure 2 shows that, with the exception of Southern Africa, credit markets are underdeveloped, with domestic credit as a percentage of GDP ranging from 11% in Central Africa to 23% in East Africa in 2021. Given the determinants of banking sector development listed above, the largest economies do not necessarily have the largest banking sectors. For example, Nigeria (12% of GDP) and the Democratic Republic of the Congo (DRC) (7% of GDP) have small banking sectors despite being large regional economies. The region of Southern Africa has a much larger banking sector thanks to the size of the banking sectors in South Africa and Mauritius. These countries are wealthier, more globally connected and have higher institutional quality than most of their peers in sub-Saharan Africa.

Figure 2. Credit depth and credit growth by region (%)

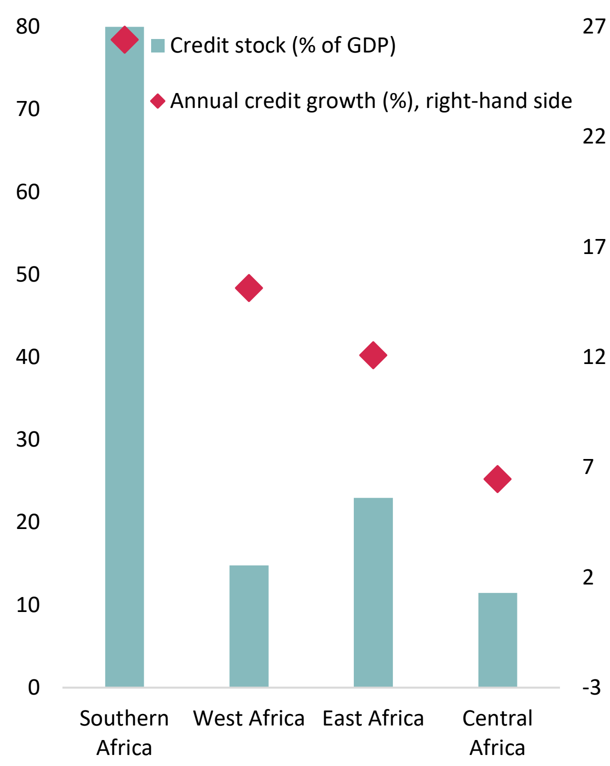
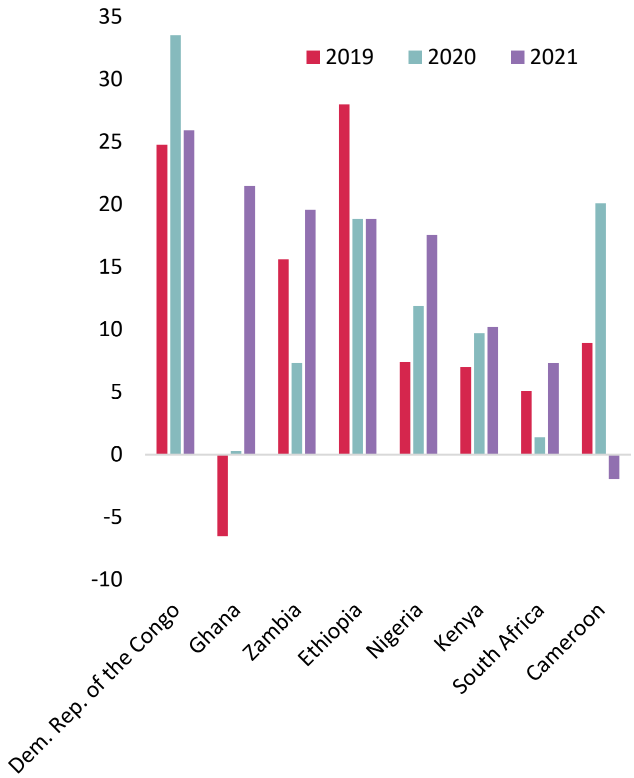


Figure 3. Annual credit growth (%) in selected countries



Sources: Orbis Bank Focus, IMF and World Bank.

The rise in public debt also risks restricting or crowding out the supply of credit to the private sector and thereby restraining investment. Crowding out occurs when banks choose to put their money in public debt rather than lend to the private sector. Even before the COVID-19 crisis, it was considered a risk for the continent's growth outlook, and the IMF noted in its Regional Economic Outlook for sub-Saharan Africa in 2017 that "the continued crowding out of the private sector may stifle the expected pickup in growth" (IMF, 2017). Recent analysis on crowding out in sub-Saharan Africa has shown that it is now at record levels, as the competition for funding from banks from both the public and private sectors has increased due to the pandemic and the post-pandemic rebound (see Box 1 for more details).

Box 1. Crowding out of the private sector in Africa

In broad terms, crowding out occurs when banks choose to play it safe by investing their money in public debt instead of riskier loans to the private sector — especially when government securities are offering competitive interest rates compared to private sector debt — thereby crowding out private sector needs and restricting investment. Crowding out is likely to be more pronounced in less developed financial systems due to the narrower availability of funding sources.

Underlying the growing concerns about crowding out in Africa is a growth slowdown across the continent and a simultaneous increase in public debt. Growth had slowed markedly before the coronavirus pandemic, compared to both the 2000s and the beginning of the decade (Figure 4b). The deterioration in public debt levels preceded the growth slowdown. Public debt had reached a record low as a share of GDP during 2010-2012, as many sub-Saharan countries benefited from debt relief granted under the heavily indebted poor countries initiative in the late 1990s.

A recent paper (Attout et al., 2022) has provided a systematic assessment of the severity of crowding out across African countries and discussed ways to mitigate its occurrence and soften its impact. The study refined the severity of the crowding out index developed by de O. Schmidt and Zwart (2018). According to the index, crowding out increases when government debt issuance increases, demand for private sector credit increases or banks' lending decisions favour public debt. The first two factors capture the demand from both the public and private sector for bank finance, so crowding out will increase as competition between the two sectors intensifies. Banks' preferences for lending to government vs. the private sector will

depend, among other things, on the risk-return characteristics of each sector. The government is traditionally considered a safer bet, but the compounded impact of the pandemic and war is changing that, as discussed earlier in Chapter 1. However, banks in many countries are also dealing with asset quality issues in their domestic loan books and continue to tighten lending standards for firms, meaning the riskiness of both sectors is increasing in parallel.

The severity of the crowding out index confirms that the risk of crowding out has been above its historic average since 2014 and has recently hit an all-time high (Figure 4a). The COVID-19 crisis boosted the supply of public debt, reflecting strong government financing needs, and put upward pressure on the index (Figure 4b). With the economy partially rebounding in 2021, the index shot up and is now close to the peak reached during 2014-2020. Pressures are high across the continent, but particularly in (from high to low) Sierra Leone, Burkina Faso, Ghana, Mali, Benin, Côte d'Ivoire and Morocco.

In the coming years, banks' approaches will be crucial to preventing crowding out from restricting economic activity. With public debt levels expected to remain high, and banks expecting increased credit demand (according to our survey), these two factors will maintain pressure on crowding out. What remains to be seen is how banks will choose to allocate capital between the public and private sectors.

Figure 4a: The severity of the crowding out index

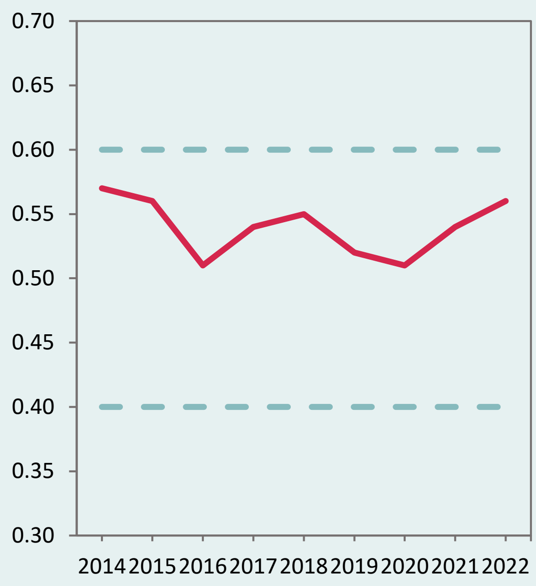


Figure 4b: African GDP growth and government debt



Source: IMF (2021), World Economic Outlook (WEO) database.
Notes: Figure 4a: 0 indicates low severity; 1 high severity; 0.5 is the average for 2004-2013. The dotted lines indicate the approximate 95% confidence interval for a neutral common factor across countries. Figure 4b: Excludes Libya, Somalia and South Sudan.

Against this background, it is important to limit the effects of the high public debt stock on private lending. Enhancing debt management capabilities and transparency will reduce debt vulnerabilities. In addition to supporting economic recovery and building resilience in the aftermath of the coronavirus pandemic, many African countries should prioritise addressing the rising public debt burden, reducing the inefficient use of funds to create a more effective public sector and promoting an environment that drives investments and private sector growth. The effective management of public resources — including the control of fiscal deficits and overall debt management — is important for macroeconomic stability and the establishment of the conditions required for structural transformation.

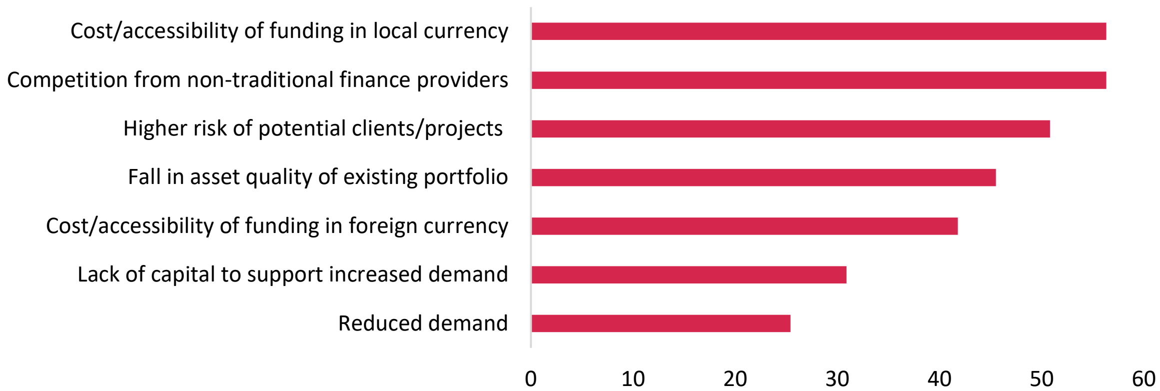
Recent developments and outlook: A view from the European Investment Bank's Banking in Africa survey 2022

The pandemic did not lead to a widespread slowdown in credit growth in large African economies (Figure 3). While Zambia, Ethiopia and South Africa saw credit growth slow in 2020 during the pandemic, several other countries, such as Nigeria, Cameroon and the Democratic Republic of the Congo, experienced an acceleration in credit growth in 2020. This was due to a combination of factors such as continued nominal GDP growth despite slower or negative real growth, robust banking support measures for credit extension in the case of Nigeria and very strong investment growth in the Democratic Republic of the Congo. As the situation began to stabilise in 2021, credit growth accelerated or remained broadly stable in most countries. On a regional basis, Southern Africa saw the fastest credit growth in 2021 (Figure 2), but this was due to growth above 300% in Zimbabwe given its rapid rate of inflation; about half of the countries in the region experienced credit growth below 10%.

The impacts of the war in Ukraine have been largely indirect, as the macroeconomic situation deteriorates and financial conditions tighten, rather than through direct financial exposure to Russia or Ukraine.[4] Lower economic growth as a result of the war might reduce loan demand in the economy, constraining the future asset and income growth of the banking sector. It could also lead to lower income and earnings for households and firms, increasing the probability of borrowers getting into payment difficulties. Higher inflation is causing central banks to raise interest rates in many countries. For borrowers, higher interest rates could also contribute to greater difficulties with loan repayments and, together with tighter lending conditions, could constrain the availability of credit. For banks, the higher interest rate environment does have a potential upside, as interest rates on loans and other bank assets increase either further or more quickly than interest rates on funding sources, leading to a higher net interest margin. However, this is not the case for all banks, especially those with a significant share of fixed-rate assets.

Against this backdrop, we asked sub-Saharan African banks what, in their view, the three most important issues they would face in the next 12 months were (Figure 5). The three biggest concerns on sub-Saharan African bankers' minds are the cost or availability of funding in local currency, competition from non-traditional finance providers such as FinTechs (see Chapter 4 for more details on financial digitalisation and the rise of FinTechs in sub-Saharan Africa) and credit risk/asset quality. Asset quality concerns predominated in last year's survey as banks witnessed the impact of the pandemic on firms' sales and profits. In contrast, local currency funding barely featured among banks' concerns last year. In terms of local currency funding, the survey responses reveal that a large share of banks expect to increase domestic funding in the next 12 months, indicating that it is the cost rather than the availability of local funding that appears to be the main concern.

Figure 5. Biggest factors affecting banks' business (% of responding banks ranking each factor in the top three)



Source: EIB Banking in Africa survey, 2022.

[4] For a more detailed explanation of the macroeconomic backdrop, please see Chapter 1.

The macroeconomic environment is leading to increased funding costs for banks. As detailed in Chapter 1, there has been a significant increase in food and energy prices following the war in Ukraine, leading to elevated inflation rates across the continent. This has meant that central banks across the globe have been increasing interest rates to battle inflation. The US Federal Reserve has also embarked on a particularly aggressive tightening cycle, putting further pressure on central banks in emerging markets to increase policy rates or face widening interest rate differentials with developed markets, which can drive capital outflows. More generally, US Federal Reserve policy, together with increased risk aversion, is leading to a global tightening of financial conditions, increasing the costs for banks to issue debt in both local and foreign currencies. Concerns expressed in the survey about the rising cost of funding means that some banks do not expect significant improvement in net interest margins in the rising rate environment.

The increased financing of public debt means that banks are holding greater amounts of government bonds on the asset side of their balance sheet (see Box 1). The IMF (IMF, 2022a) also finds that for a broad range of emerging market countries, bank exposure to sovereign debt is higher in countries with high public debt, and this also tends to be associated with lower capital adequacy, an empirical characterisation of the so-called sovereign–bank nexus. As the price of government assets falls, it creates losses for banks, reducing investment income. It also reduces the market value of the government debt that the banks can use as collateral to obtain funding, increasing their liquidity constraints. The deteriorating fiscal position of many sovereigns also raises concerns about the ability of governments to step in and provide support to banks in the event of a financial crisis. The weakening of this implicit guarantee for the banking sector can also increase borrowing costs for banks.

Another major risk perceived by the banks responding to our survey is that of a deterioration in the quality of their portfolios and a potential decline in their clients' creditworthiness. Concerns about the riskiness of future lending operations may be linked to the ways in which the war can reduce asset quality. Lower economic growth is associated with lower income and earnings for households and firms, increasing the probability of borrowers getting into payment difficulties. More broadly, supply shortages, rising input costs and higher consumer price inflation also hurt debt affordability, as more income is diverted to cover the costs of essentials rather than to service debt. Debt affordability is also directly challenged by the rise in interest rates. Asset quality can therefore be affected by the war in several different ways.

In contrast, banks' concerns about recent or existing asset quality performance are more likely linked to the pandemic, but there are significant differences in asset quality across sub-Saharan Africa. Central Africa is the region with the greatest existing issues with non-performing loans at 19% of gross loans, which is roughly 10 percentage points higher than the other regions, each of which have NPL ratios of 8–9% (Figure 6). Central Africa (13%) and West Africa (16%) also have lower capital to risk-weighted asset ratios than East Africa (19%) or Southern Africa (19%), meaning they have less capacity to absorb any new problems related to asset quality.

Figure 6. Asset quality, solvency and profitability (%)

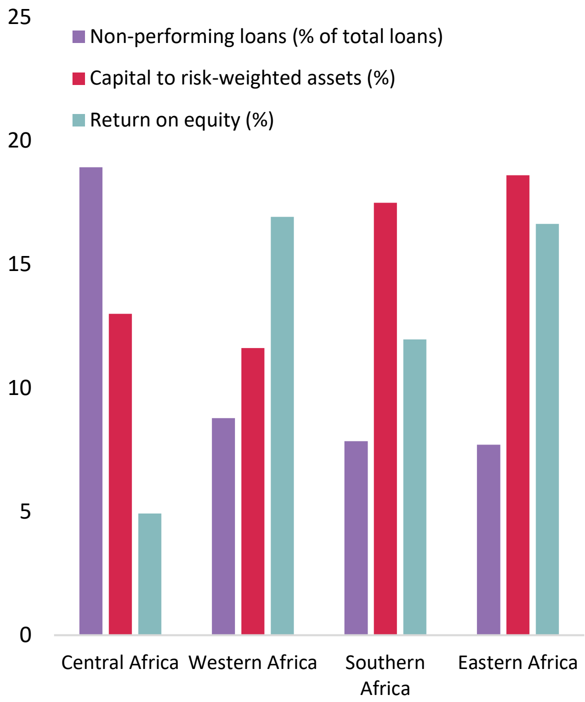
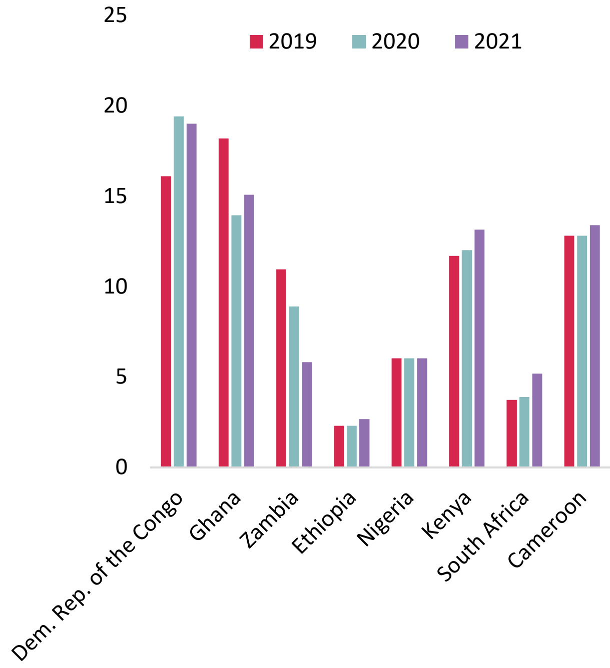


Figure 7. Trends in non-performing loans (% of total loans) over time



Sources: Orbis BankFocus, IMF and World Bank.

Headline non-performing loan numbers have generally shown only modest deterioration, albeit from generally high levels. The policy measures introduced during the pandemic to support financial sectors across Africa have curtailed NPL ratios to date (Figure 7). In many countries, non-performing loans were flat or, in some cases, even fell between 2019 and 2020. There is some evidence that non-performing loans were again creeping upward in 2021, with ratios higher in South Africa, Ghana, Kenya and Cameroon, for example, but time will tell how the impact of the war compounds that of the coronavirus pandemic. However, the concerns regarding non-performing loans cited by a large share of responding banks could mean that they expect NPL ratios to increase, even before this is reflected in official data.

Policy support remains widespread more than two years on from the start of the pandemic. A World Bank database tracks support measures for banks, classified as either borrower support or prudential support. Guarantees, together with subsidies and moratoriums, have accounted for the bulk of borrower support measures introduced since the start of the pandemic. Prudential measures include the relaxation of treatment of non-performing loans, restrictions on the use of profits and the relaxation of capital requirements. Southern African countries were the most proactive in terms of introducing these prudential and borrower support measures (Figure 8), partly reflecting a greater degree of sophistication in the financial sector. East African countries also introduced a significant number of measures. Some of these measures were phased out relatively quickly in Southern Africa, mainly in 2020, but it still has the highest average share of measures in place (four). East Africa also terminated some measures over the course of 2020 and 2021, but there has been little attempt in Central or East Africa to withdraw this support (Figure 9). The European Investment Bank survey asked banks about their use of guarantee schemes, and just over 60% of banks reported that they had benefited from a loan guarantee scheme in the last 12 months, indicating the ongoing use of these measures. International financial institutions were the providers of these guarantees in 40% of cases, followed by the government in just under 30% and other sources in the remaining 30%.

Figure 8. Average number of coronavirus pandemic banking sector-related policy measures introduced by region

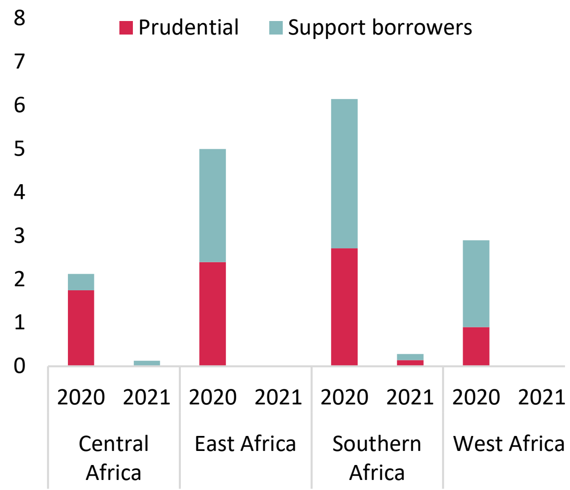
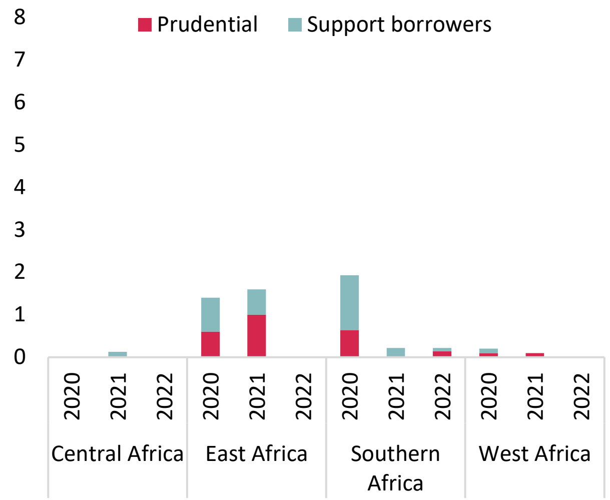


Figure 9. Average number of coronavirus pandemic banking sector-related policy measures terminated by region



Source: World Bank COVID-19 Finance Sector-Related Policy Database.

The survey further reveals that asset quality problems are worse for small businesses. For the corporate[5] loan book, the percentage of banks with a significant share of non-performing corporate loans is close to 21%.[6] In contrast, 37% of banks have a significant share of non-performing loans in the SME loan book, which is notably higher than it is for large firms. The difference in asset performance by firm size could be due to small and medium firms' operating in sectors that have been harder hit since the pandemic. However, it may also be the case that smaller firms have fewer financial resources to cushion them in the event of a shock. As this chapter shows later, a similar pattern is observed with microfinance institutions, whereby smaller institutions, which lend to smaller borrowers, are suffering from higher levels of problem loans.

Figure 10. Problem loans to corporates (% of responding banks)

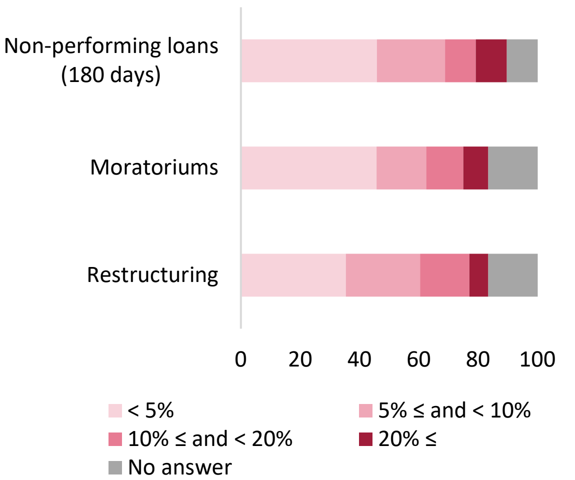
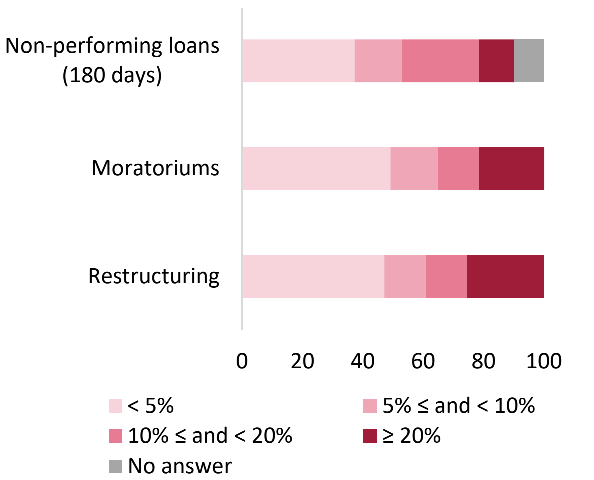


Figure 11. Problem loans to SMEs (% of responding banks)



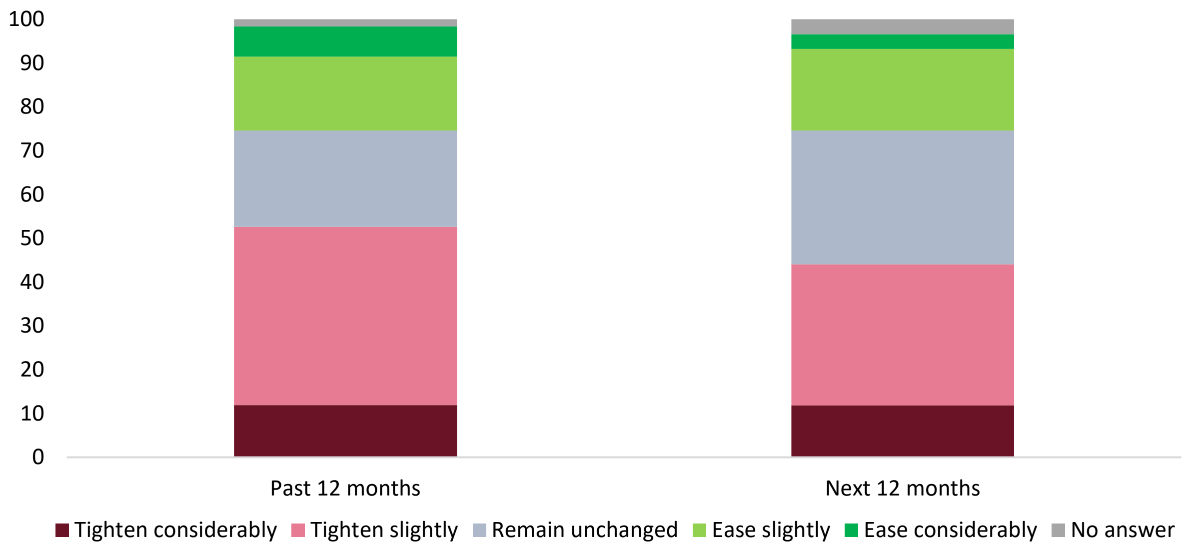
Source: EIB Banking in Africa survey, 2022.

[5] "Corporate" is used to refer to non-SME firms so it applies to larger companies.
[6] A significant share of non-performing loans is defined here as more than 10% of the loan book.

The gradual unwinding of policy support measures at least partly explains banks' concerns with asset quality. About one-fifth of banks have more than 10% of the corporate loan book under moratoriums, while a similar share of banks have more than 10% of the corporate loan book restructured[7] (Figure 10). For small and medium firms, more than one-third of banks have more than 10% of the book under moratoriums, and two-fifths of banks have more than 10% restructured (Figure 11). For a majority of these banks, more than 20% of the SME book has been restructured. Thus, the asset quality problems of banks extend beyond the headline NPL figures and the pandemic's impact is unlikely to have yet been fully reflected in non-performing loans, as there is potential for these other types of problem loans to convert to non-performing loans. The impact of the war may further add to these loan quality pressures. On the plus side, the increased time allotted to banks to deal with problem loans thanks to forbearance measures gives them an opportunity to build capital buffers before all support measures are withdrawn.

Credit standards were tightened in 2021 following the onset of the pandemic, and further tightening is expected in 2022 (Figure 12). In 2021, 29% of banks introduced net tightening[8] of credit standards, although this is expected to drop to 22% of banks in 2022. This net tightening is common across all the regions, except for East Africa, where banks expect a net easing of 5%. Nonetheless, the net tightening in 2022 is significant, coming on the back of the tightening of standards in both 2020 and 2021. In last year's survey, banks had expected credit standards in 2021 to be broadly stable, so the recorded net tightening in 2021 meant banks applied more restrictive lending standards than they had been planning to at the beginning of the year. This means there is a risk that the change in lending standards predicted for 2022 could also be worse, depending on how the deteriorating macroeconomic environment affects banks, especially as inflation remains elevated, maintaining pressure on central banks to tighten policy.

Figure 12. How credit standards have changed/will change (% of responding banks)



Source: EIB Banking in Africa survey, 2022.

Banks report that the main factors restricting lending in 2021 related to loan applications, such as a lack of acceptable collateral or a poor credit history. Inadequate collateral was considered a very severe, major or moderate constraint by 83% of banks lending to small and medium firms (Figure 13). A similar percentage of banks cited poor credit history as a constraint when lending to the sector, but the answers were more heavily weighted towards "severe constraint" in the case of the collateral requirement. When it comes to lending to larger corporates, the corresponding shares of banks quoting collateral and credit history as material constraints are 52% and 42%, respectively. This highlights the additional hurdles that small firms face when trying to access

[7] These categories are mutually exclusive — a loan cannot be classified as both restructured and under moratorium.
[8] The net tightening in credit standards is defined as the sum of banks reporting that credit standards either slightly or considerably tightened minus the sum of banks reporting that credit standards either slightly or considerably loosened.

bank finance.[9] Lack of collateral was the main constraint in the European Investment Bank's survey last year, too. Moreover, using firm-level data from the World Bank Enterprise Surveys since 2016, Box 2 in this chapter also cites collateral as a bigger problem in sub-Saharan Africa when compared to other regions, highlighting a structural problem for SMEs when it comes to lacking collateral.

The next most significant factor holding back lending last year was a decline in asset quality. This was a very severe, major or moderate constraint for 64% of banks lending to SMEs and almost 58% of banks lending to corporates. No bank cited asset quality as a severe constraint for lending to large corporates, whereas 8% did for lending to small and medium firms. The differences here reflect the differences in the quality of the existing asset loan books for SMEs and corporates. A reduction in asset quality was not a response option for this question in 2021, but several banks did cite asset quality as one of their chief concerns, as they did again in 2022. The least important factor constraining lending for banks was a lack of demand; for both corporates and small firms, the share of banks citing it as one of their main constraints was low. This may partly be due to the resurgence in economic growth witnessed across most parts of the continent in 2021, as economies rebounded from the pandemic shock.

Figure 13. Factors limiting lending to corporates and small and medium-sized enterprises in the last 12 months (% of responding banks)



Source: EIB Banking in Africa survey, 2022.

Box 2. Constraints on firm financing

The World Bank's Enterprise Surveys offer a complementary perspective on firms' access to finance. They provide a representative sample of an economy's formal private sector. The surveys are administered face-to-face and cover a wide range of business environment aspects, including access to finance. They focus on the more structural aspects of the business environment and are administered at a low frequency. Coverage of sub-Saharan Africa is limited, and the results of Figure 14 and Figure 15 are based on the 18 economies that have fielded Enterprise Surveys since 2016.

According to Enterprise Survey data, a large share of firms in need of a loan are unable to obtain one, and are thus credit constrained. Figure 14 provides evidence of the prevalence of credit constraints in the region. Credit-constrained firms are defined as firms that need a loan but either have their loan application rejected or are discouraged from applying in the first place. In particular, discouraged firms needing a loan have refrained from applying because of what they perceive as complex

[9] Please see Box 2 on problems with access to finance from the firm perspective to see how the collateral issue is also highlighted as a major problem in the firm-level data.

application procedures, unfavourable interest rates, high collateral requirements, insufficient loan amounts, fear of being rejected or other unspecified reasons. Only firms needing a loan can be credit constrained. Figure 14 therefore expresses credit-constrained firms as a percentage of firms needing a loan. According to the survey, almost 74% of firms in countries with available data that need a loan are credit constrained, exceeding the lower middle-income country benchmark of 69% by a moderate margin.[10] In the sample, 45% of firms are credit constrained, compared to 37% in the lower middle-income benchmark. The vast majority of credit-constrained firms are discouraged from applying for a loan. Rejections, on the other hand, are rather rare across all countries. In this regard, sub-Saharan Africa is similar to the benchmark region.

Figure 14. Credit-constrained firms (in % of firms needing a loan)

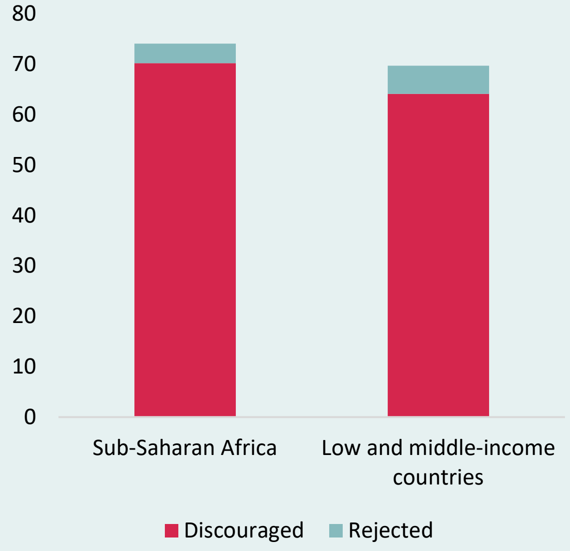
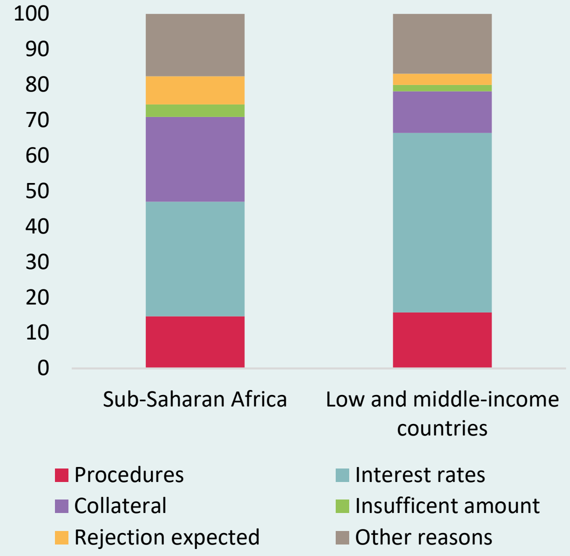


Figure 15. Factors discouraging firms from applying for a loan (in % of discouraged firms)



High interest rates, stringent collateral requirements and complex application procedures discourage firms from applying for loans. Given the high share of discouraged firms among credit-constrained firms, it is useful that the survey provides additional information on why firms are discouraged. Figure 15 shows that firms most frequently cite high interest rates as the reason that they did not apply for a loan, even though interest rates appear to play a less important role in sub-Saharan Africa than in the benchmark region.

Sub-Saharan Africa stands out for its comparatively high share of firms that are discouraged by stringent collateral requirements, something that is also reflected very strongly in the European Investment Bank's survey. Complex application procedures can also be a result of the association between credit constraints and firm capacity. Ultimately, this reflects constraints on both the supply and the demand side of the market, whereby clients might not be sophisticated enough to feel confident in approaching a bank, but banks may also not have appropriate lending programmes in place. It is also important to note that complaints about high interest rates cannot be viewed in isolation from the returns companies are able to generate with their assets. Firms discouraged by high interest rates implicitly state that their marginal cost of funding is high relative to the marginal return on capital.

Collateral constraints appear to result from a scarcity of assets. Figure 16 provides additional evidence of secured transactions in the region. Specifically, Figure 16 shows the median as well as the 25th and the 75th percentiles of the ratio of collateral to loan value for collateralised loans. The median firm in sub-Saharan Africa reported a collateral ratio of 175% of the loan value compared to 200% in the benchmark region. However, collateral practices in sub-Saharan Africa appear to be rather diverse, as reflected in a greater dispersion of the distribution relative to the benchmark countries. For example, 25% of companies in sub-Saharan Africa are asked to provide collateral equivalent to 300% of the loan.

[10] This group consists of the following lower middle-income economies: Egypt, Kyrgyz Republic, Moldova, Mongolia, Morocco, Tunisia, Ukraine, Uzbekistan, West Bank and Gaza. The surveys are part of a recent data collection effort undertaken by the European Bank for Reconstruction and Development (EBRD), the European Investment Bank and the World Bank that comprises 41 economies in North Africa, the Middle East, Europe and Central Asia.

Figure 16. Ratio of collateral value to loan value (in % of loan value)

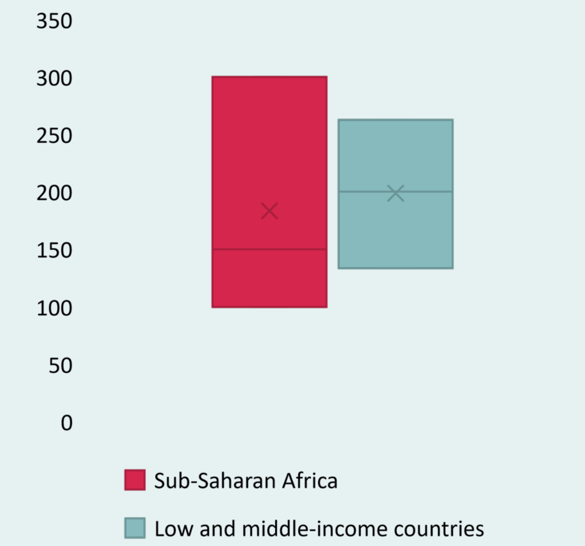
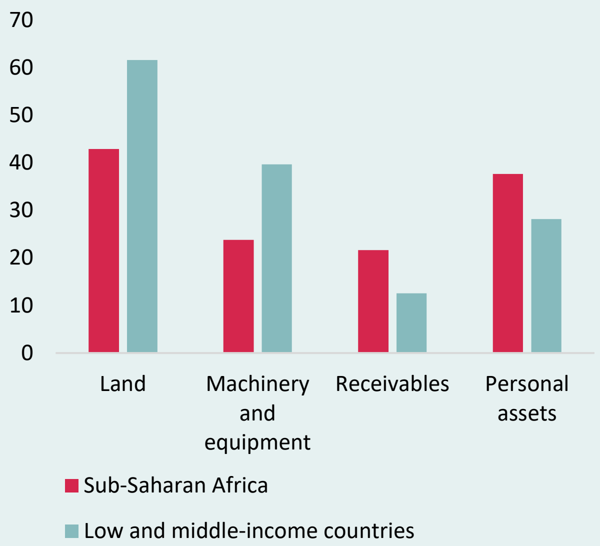


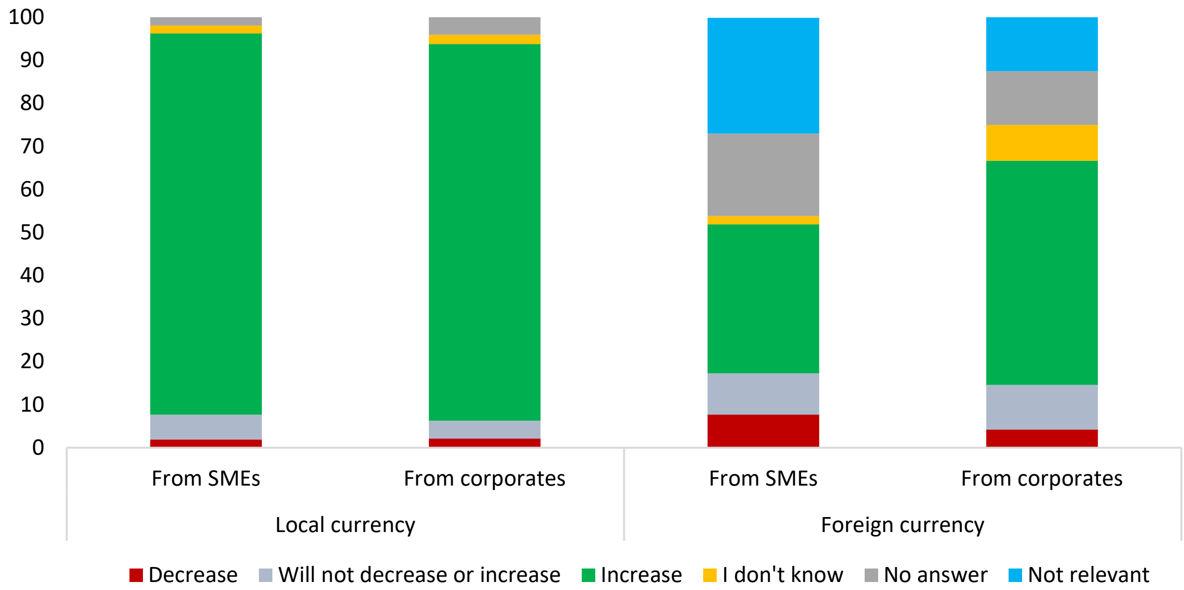
Figure 17. Types of collateral pledged (in % of loans requiring collateral)



Entrepreneurs frequently secure business loans with personal assets. Across asset classes, land and buildings remain the assets most frequently pledged, either alone or in combination with other assets. This may reflect the greater retention value of land in high inflation environments, lower depreciation and the perception that it is a more liquid/safe form of collateral (Figure 17). However, entrepreneurs in sub-Saharan Africa pledge personal assets almost as frequently as land. At 38%, the share of respondents that pledge personal assets exceeds the lower middle-income benchmark by 10 percentage points. The strong role of personal assets deserves further scrutiny, though it is consistent with a scarcity of business assets. In addition, it favours wealthy entrepreneurs.

Despite a more challenging growth outlook in 2022, banks expect loan demand to increase from both corporates and small and medium businesses, but demand for credit in local currency is expected to significantly outstrip that for foreign currency loans (Figure 18), particularly in East and Southern Africa. Nearly 90% of banks expect to see an increase in local currency loan demand from small and medium firms and corporates. This drops to half of corporates and one-third of SMEs when it comes to foreign currency loans, possibly due to higher interest rates on foreign currency loans, but it could also be driven by weakness in domestic currencies, which has been observed in several countries owing to the tightening of monetary policy in advanced countries. Of course, one would naturally expect there to be a structural element to higher loan demand in the local currency than foreign currencies in most economies. In the 2021 Banking in Africa survey, banks also expected loan demand to be stronger in local currencies than foreign currencies. The large share of banks expecting growth in overall loan demand suggests that banks have a relatively upbeat assessment of demand despite economic growth forecasts having been cut in a majority of countries in sub-Saharan Africa. Perhaps banks had not yet fully internalised the impact of the war or believed that its effects would be contained. Of course, banks might also be expecting loan demand to grow but at a slower pace than last year; however, this cannot be precisely determined from the survey data.

Figure 18. Expected change in the demand for credit (% of responding banks)



Source: EIB Banking in Africa survey, 2022.

The vast majority (89%) of banks that participated in our survey also expect to expand their lending operations in the next 12 months. This expectation is common across all the regions and partly reflects the ambition of every business to grow, but the corresponding percentage last year was 82%, suggesting that banks are somewhat more optimistic in 2022 than 2021, based on their initial assessment of the likely impact of the war. This is encouraging, given that there are clear concerns about issues such as asset quality. In 2021, the share of banks that actually managed to expand operations was 66%, which did not match the ambitions set at the start of the year. Given that banks again expect to tighten lending standards, it shows they are keen to expand operations but are likely to take a cautious approach to doing so in the current environment.

Three-quarters of responding banks expect to increase their funding, with a noticeable bias towards domestic rather than foreign currency funding. More than 90% of banks said that they would either probably or certainly increase local currency funding, compared to less than 60% that planned to do so in foreign currency. Taking a view across all funding lines, deposits were the most commonly used source of funding in the last 12 months and are likely to remain similarly important in the next 12 months.[11] In the past 12 months, the interbank market, international financial institutions and local currency bonds were used to raise funds by 55–60% of banks. This demonstrated a reduction in reliance on international financial institution funding compared to 2020, when 73% of banks used international financial institutions as a funding source. In the next 12 months, however, the share of banks obtaining funding through international financial institutions is expected to rebound back to 73%, in line with the share planning to use deposits. The funding lines seeing a large decrease in usage are local currency bonds, followed by interbank funding. For local currency funding, the decision of banks to move away from local currency bonds to other sources may reflect greater price sensitivity in these bonds to tighter global financial conditions relative to other local currency funding sources. In contrast, central bank funding, intragroup funding and foreign currency bonds are likely to be used by more banks in the next 12 months, although foreign currency bonds are likely to remain the least utilised.

[11] The share of banks planning to use a funding source in the next 12 months is calculated as those both certainly and probably likely to use a funding source, according to the survey.

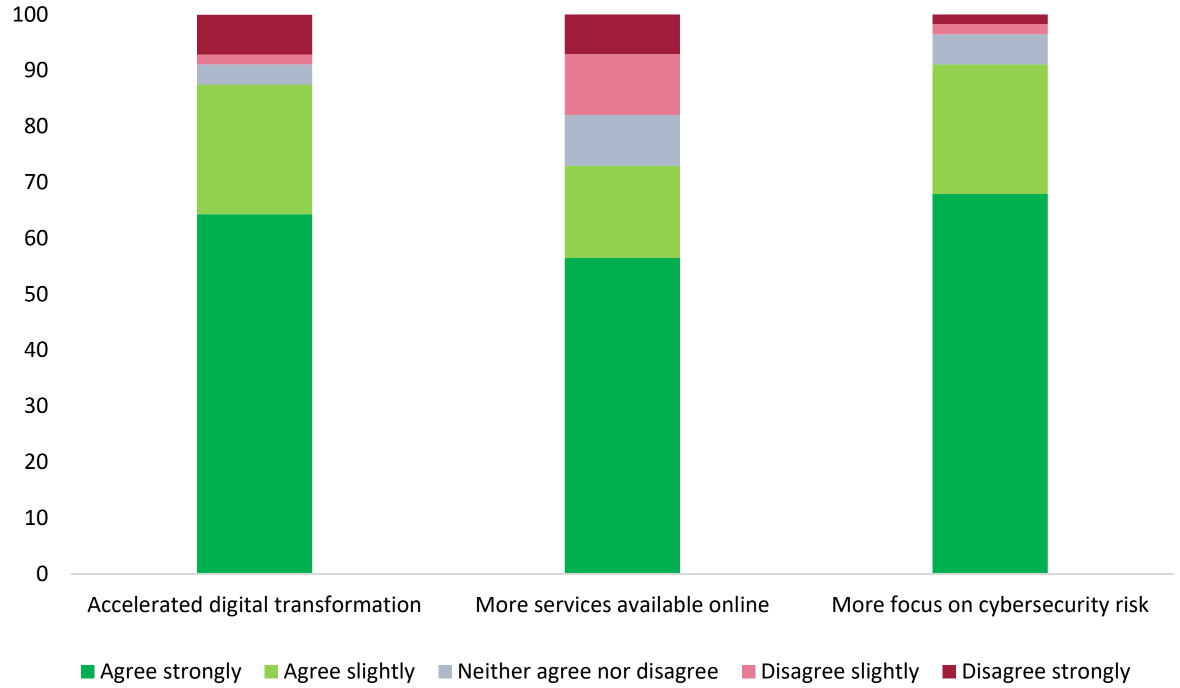
Figure 19. Funding sources, past 12 months and next 12 months (expected % of banks surveyed)



Source: EIB Banking in Africa survey, 2022.

While the economic and financial effects of the war in Ukraine dominate the current outlook, it is worth bearing in mind that banks in sub-Saharan Africa are becoming increasingly digital, faced with increased competition from the FinTech sector and following a need to reach customers digitally during the pandemic. This change is evident across multiple areas in the survey, applying to both banks' own internal processes and the ways in which they deal with their customers. Over 60% of respondent banks "strongly agree" that the pandemic has accelerated their internal digital transformation, rising to 90% when those banks that simply "agree" are also included (Figure 20). In addition, 70% of banks either agree or strongly agree that they have increased their range of online services as a direct result of the pandemic, highlighting the steps banks have needed to take to reach customers during the pandemic. It is also the view of nearly 90% of banks (not shown in the chart) that this shift in customer preferences is likely to last. The pandemic therefore appears to have accelerated a shift in the way that financial products are being delivered to customers. Of course, this acceleration of inward and outward digital transformation carries risks. The vast majority of banks also think that the importance of addressing cybersecurity risk has increased (Figure 20), meaning there is a need to increase the resilience of systems. In contrast to these seemingly enduring changes, there is some evidence that the day-to-day operations of banks (in terms of branch closures and remote working operational risk) are returning to some degree of normality, with only 7% of banks strongly agreeing, and a further 30% agreeing, that operations are still being significantly impacted.

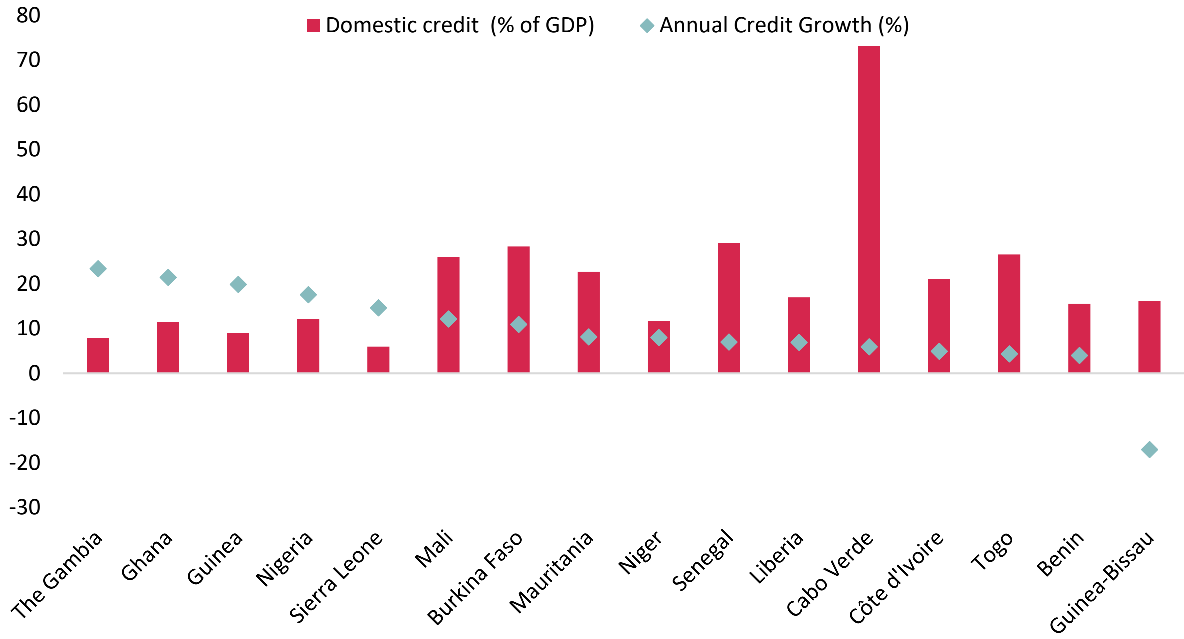
Figure 20. Impact of COVID-19 on bank digitalisation (% of responding banks)



Source: EIB Banking in Africa survey, 2022.

Banking in West Africa

Figure 21. Credit depth and credit growth, West Africa



Source: World Bank and Moody's Analytics BankFocus.

Competition in the banking sector in West Africa is strongest in the largest countries, with weaker competition in some of the smaller nations. The banking sector in West Africa comprises 221 banks, most of them located in the West African Economic and Monetary Union (WAEMU).[12] The largest countries in the region feature more competitive banking sectors, with the top three banks holding less than 50% of banking assets in Ghana (31%), Côte d'Ivoire (40%) and Nigeria (48%). Smaller, more fragile economies feature highly concentrated banking systems with low levels of intermediation. In Togo, Liberia, The Gambia, Guinea-Bissau and Cabo Verde, the top three banks own over 70% of total bank assets, hinting at weaker competition, low intermediation levels and more expensive lending. In the West African Economic and Monetary Union, foreign ownership stood at 56%, while the state's share of bank capital was at 18% of total capital in 2020.

Although expanding, financial intermediation remains low in the region. In 2020, credit expanded by an average of 10% in the region. Countries outside the West African Economic and Monetary Union experienced higher growth rates in credit, partly on account of higher inflationary pressures. With the exception of Cabo Verde, credit to the private sector is below 30% of GDP for all countries and less than 20% of GDP for nine of those countries. Credit depth is shallow in Nigeria (12% of GDP) and Ghana (11% of GDP), the two largest countries in the region, owing to a combination of low wealth levels, high levels of informality in the economy that constrain firm credit growth and a tendency by banks to hold sovereign debt over lending domestically. With credit to the private sector at less than 8% of GDP, Sierra Leone and The Gambia score amongst the bottom ten countries worldwide. Banks' liquidity is at exceptionally high levels as domestic demand was curbed by the coronavirus pandemic, resulting in higher savings and deposits. As a result, deposits are currently 37.5% higher than they were just before the pandemic. Overall, low levels of banking penetration and poor intermediation are creating opportunities for FinTechs (see Chapter 4 for more details).

Asset quality remains a concern, with downside risks due to the war in Ukraine and the ensuing tightening in monetary conditions. WAEMU banks' gross non-performing loans stood at 11.3% of total loans in June 2021. Yet, the provision rate remains high at 67.1% of non-performing loans in mid-2021, signalling that banks anticipate higher new non-performing loans. The latter is constraining banks' profitability, with the return on equity having already fallen to 13.9% in 2020 from 15.3% in the previous year. Following a significant drop in the NPL ratio since 2017, Nigerian banks have seen their NPL ratio remain steady at close to 6% since the onset of the pandemic. This is one of the lowest NPL ratios in the region, partly due to high oil prices. Fitch Ratings (2022) shows that historically, there is a close inverse relationship between non-performing loans and oil prices in Nigeria, owing to the high exposure of banks to the oil and gas sector (30% of the loan book, on average). Banks in Ghana have higher problem loans, with the NPL ratio at 15%. Like Nigerian banks, banks in Ghana also extend significant credit to the government, which goes some way towards explaining high levels of profitability recently. Almost one-quarter of the loan portfolio of Liberian banks was not performing as of December 2021, on account of the halt in trade and services due to the coronavirus pandemic. Looking forward, pressure from the war in Ukraine and higher international and domestic prices will lead to a tightening of monetary conditions and could eventually put upward pressure on non-performing loans.

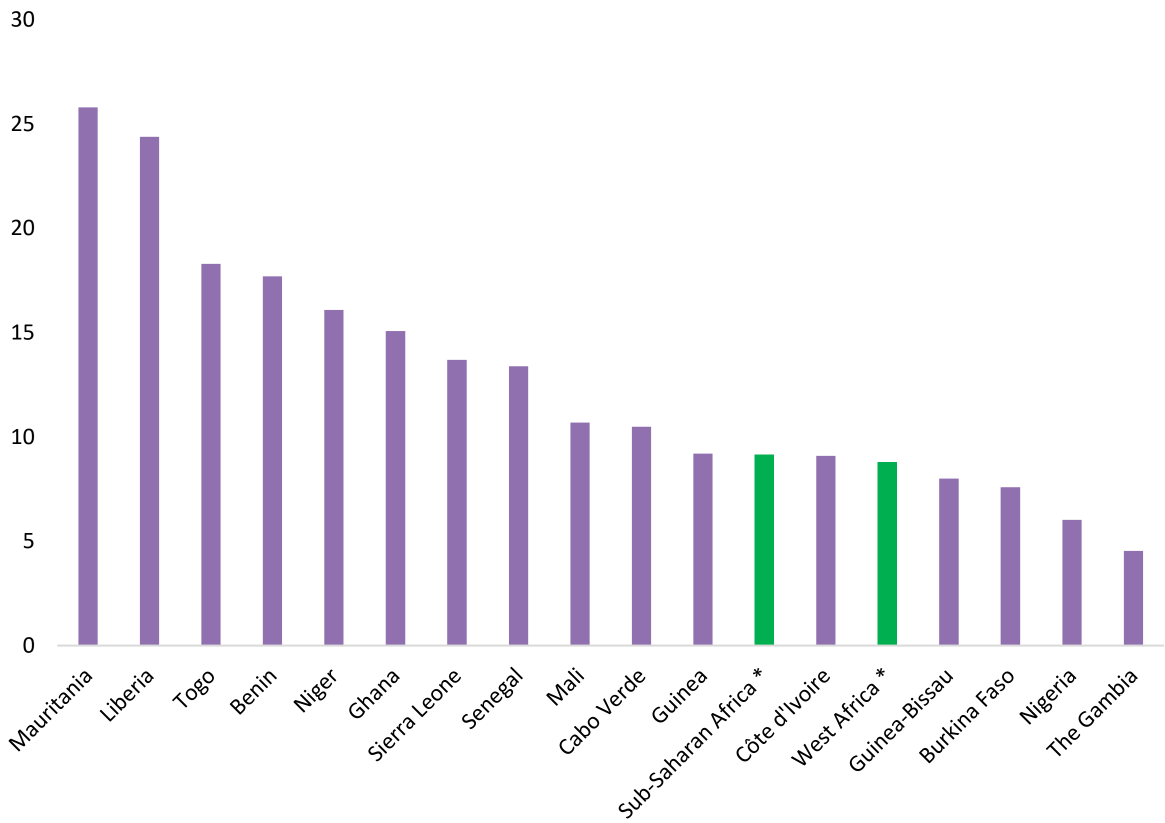
The pandemic has challenged bank capitalisation in West Africa. In the West African Economic and Monetary Union, the average bank capital adequacy ratio increased from 11.5% at the end of 2019 to 11.8% at the end of 2020, on the back of a call by the Banking Commission to limit the distribution of 2020 dividends, and reached 12% at the end of June 2021. This is above the current regulatory norm of 9.5% or 11.5% that will be expected of banks from 2023 onwards.[13] Of the 128 banks in the West African Economic and Monetary Union, 107 comply with the regulatory norm. According to the IMF (2022b), WAEMU banks' immediate recapitalisation needs stood at 1.9% of GDP on account of increasing non-performing loans, which, despite the increase in capital, are not adequately provisioned. Sovereign debt accounts for nearly 35% of bank assets in 2021, up from close to 25% as recently as 2019, creating additional risk. Banks in Nigeria are generally well capitalised, with a capital to risk-weighted asset ratio of 15%. The capital ratio in Ghana is 20%, which compares favourably with peers and offers

[12] The West African Economic and Monetary Union (WAEMU) is an organisation whose mission is to bring about the economic integration of the member states (Benin, Burkina Faso, Côte d'Ivoire, Guinea-Bissau, Mali, Niger, Senegal and Togo) by enhancing the competitiveness of their economies in the framework of an open and competitive market, and a streamlined and harmonised legal environment. It is distinguished by the recognition of a common monetary unit, the franc of the African financial community, or CFA franc, which is issued by the Central Bank of West African States (BCEAO).

[13] As part of the prudential response to the coronavirus pandemic, the Central Bank of West African States (BCEAO) extended the transition to Basel II/III bank prudential requirements by one year (to 2023), and the regulatory capital adequacy ratio remained at 9.5% before gradually increasing to 11.5% by 2023.

some loss absorption capacity, and return on equity is 20%. In more fragile economies in the region, like The Gambia, Liberia and Sierra Leone, banks tend to be highly capitalised, but this is largely the result of low levels of intermediation and high shares of sovereign securities in banks' assets. In these countries, the capital adequacy ratio stood at around 30%. In Sierra Leone, the ratio of capital to risk-weighted assets stood at 49% as of March 2021.

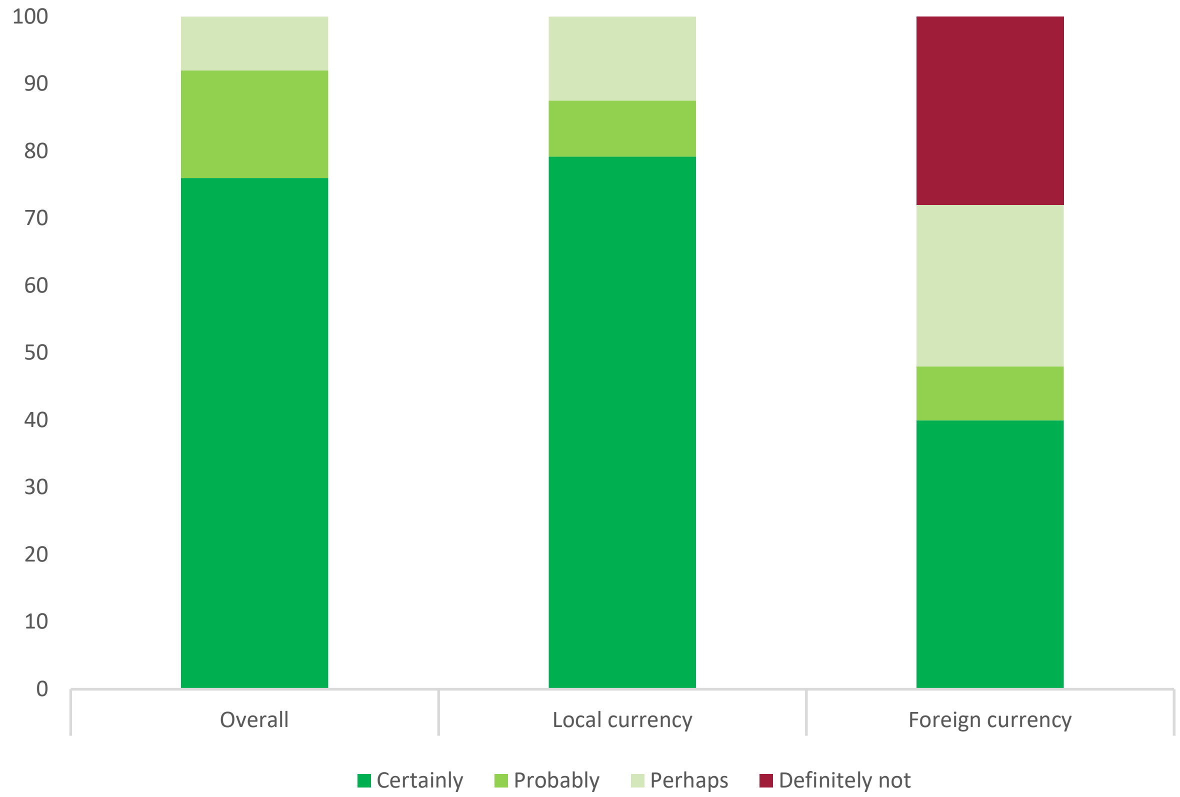
Figure 22. Non-performing loans, West Africa (in %)



Source: World Bank and Moody's Analytics BankFocus.
** GDP-weighted average.*

Over the next 12 months, 92% of the West African banks surveyed in the European Investment Bank's **Banking in Africa survey expect to expand their activities (Figure 23)**. This expansion is higher than what was expected a year earlier (80%) and is anticipated to be facilitated by increased funding, especially in local currency (88% of respondents plan or are considering an increase) rather than in foreign currency (48% planning or considering). The increased optimism shown by banks in the region suggests that the anticipated spillovers from the war have not dampened banking confidence. Compared to the 2021 survey, banks are less inclined to increase their funding in foreign currency (in 2021, 57% of West African banks were planning to or considering increasing their funding over the next 12 months). This difference in the responses may be attributed to a higher foreign exchange risk aversion on account of uncertainties relating to the war in Ukraine and higher volatility in foreign exchange markets.

Figure 23. Plans for operations and funding in the next 12 months (% of responding banks)



Source: EIB Banking in Africa survey, 2022.

Most West African banks expect credit demand in local currency to increase, particularly from small and medium businesses, but they will remain cautious about lending. In the 2021 survey, slightly less than 30% of banks surveyed in the sub-region expected a further tightening of credit standards compared to 2020. This was because they expected the much-awaited economic recovery after the coronavirus pandemic. However, subsequent COVID-19 waves, together with the unfolding war in Ukraine, weighed heavily on economic activity. As a result, 54% of banks surveyed in 2022 declared they had tightened their credit standards in the last 12 months. Macroeconomic uncertainties are weighing heavily on banks' lending prospects, with half of banks surveyed expecting credit standards to tighten further in the next 12 months (Figure 25). Looking at lending to small and medium enterprises, 90% of banks expect an increase in demand for local currency lending. Only 20% of banks expect an increase in foreign currency lending for small and medium firms.

Figure 24. Expected change in demand for credit from SMEs (% of responding banks), West Africa

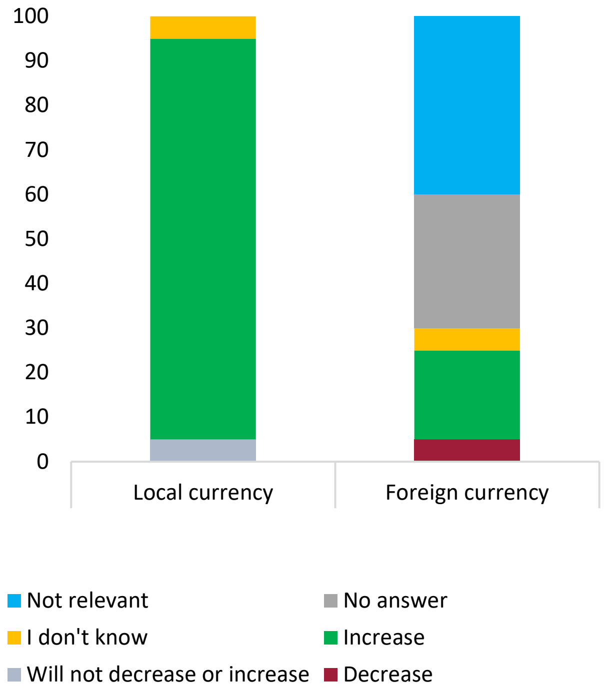
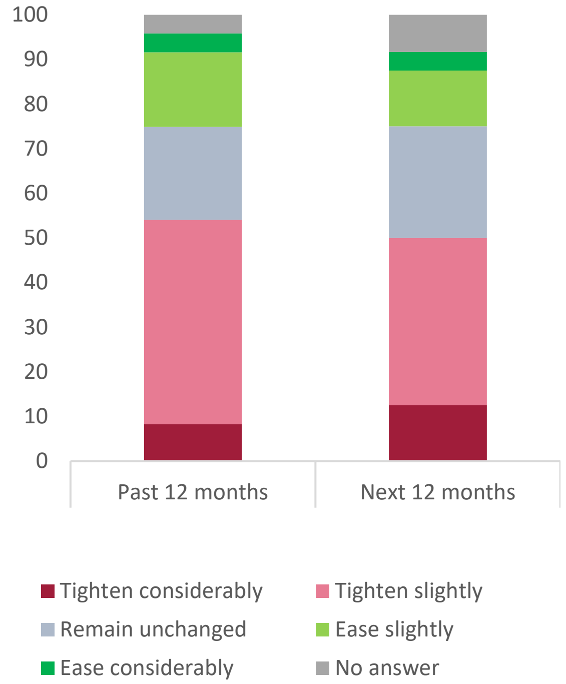


Figure 25. How credit standards have changed/will change (% of responding banks), West Africa



Source: EIB Banking in Africa survey, 2022.

Lack of acceptable collateral and poor credit history remain key factors constraining lending (Figure 26). The majority of banks surveyed consider these two factors as moderate, major or severe constraints on both corporates and small and medium firms. For SMEs, these issues are even more severe (Figure 26). As in the 2021 Banking in Africa survey, a lack of bankable projects remains the third biggest impediment according to banks, which is a bigger problem in West Africa compared to other regions. Half of the banks surveyed perceive a deterioration in asset quality following the coronavirus pandemic as the fourth biggest constraint on credit supply to firms.

Figure 26. Factors constraining credit supply (% of responding banks), West Africa



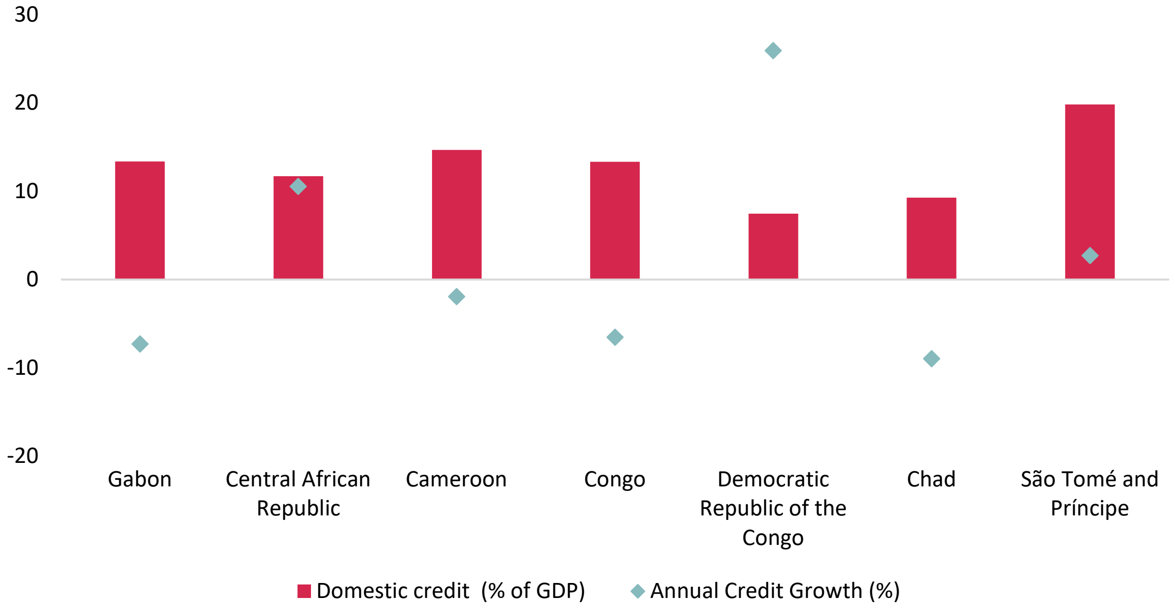
Source: EIB Banking in Africa survey, 2022.

Banking in Central Africa

Central Africa is the region with the lowest number of banks and the highest banking concentration in Africa, with only 46 (down from 58 in Finance in Africa 2021) banks that report data publicly (Table A2 in the Appendix). Central Africa accounts for only about 9% of sub-Saharan Africa's total GDP (IMF, 2022c), and the region's three largest economies — Cameroon, the Democratic Republic of the Congo and Gabon — contribute to 75% of Central Africa's GDP. These countries also account for 86% of the region's total banking assets, which is broadly unchanged from Finance in Africa 2021.[14] The small number of banks in the region restricts competition and locks in high levels of banking concentration. Banking concentration (here measured as the assets held by the top three banks) in Central Africa is lowest in Cameroon (49%) and the Democratic Republic of the Congo (67%), while few banks in the smallest economies report their assets publicly, meaning that the Moody's Analytics BankFocus data reflect 100% concentration (Table A2 in the Appendix).

[14] Asset data are based on 46 of the 46 Central African banks for which total asset data are available in Moody's Analytics BankFocus.

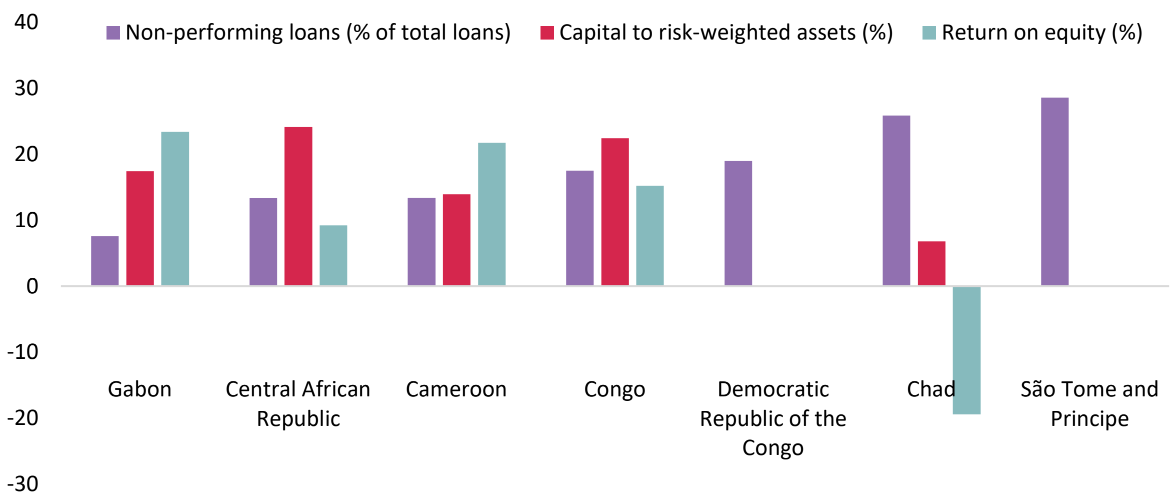
Figure 27. Credit depth and credit growth, Central Africa (%)



Source: World Bank and Moody's Analytics BankFocus.

Central Africa is characterised by shallow credit markets, lagging well behind East and West Africa, but there is significant variation in market depth at the country level (Figure 27). Credit to the private sector is low at only 11.5% of GDP across the region, compared to an average of 38% for Africa as a whole. São Tomé and Príncipe has the highest share of credit to GDP (20%), compared to just 7% of GDP in the Democratic Republic of the Congo and 9% in Chad. Credit growth in the region remained robust in 2020 despite the onset of the pandemic, with just three of the eight countries seeing a slowdown in credit growth compared to 2019. There was a broader slowdown in credit growth in 2021. Four different countries experienced slower credit growth in 2021 compared to 2020, including a sharp slowdown from 20% to -2% in Cameroon, which dragged down the regional growth owing to the large size of Cameroon's economy. The Democratic Republic of the Congo had the fastest credit growth at 26% annually, even though this also represented a slowdown from 34% in 2020.

Figure 28. Solvency, profitability and asset quality indicators, Central Africa (%)

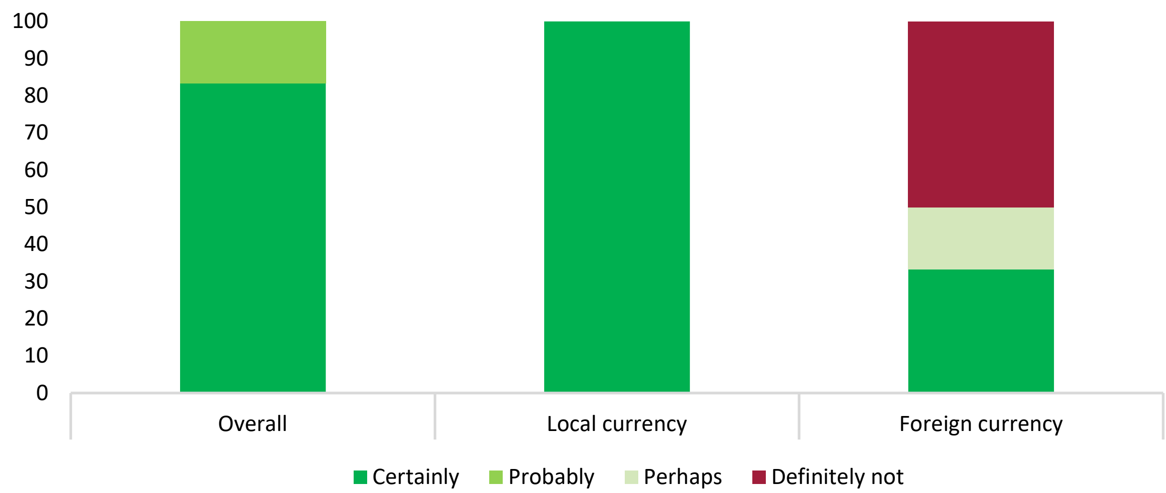


Source: World Bank and Moody's Analytics BankFocus.

Central Africa has the highest non-performing loan ratio and the lowest profitability among the regions in sub-Saharan Africa. Banks' profitability in the second quarter of 2021, as measured by return on equity (ROE), ranged from -19% in Chad and -5% in Equatorial Guinea to 9% in the Central African Republic and 23% in Gabon (Figure 28). For most countries in the region, profitability declined compared to the previous year, reflecting the impact of the pandemic on the region's economies and financial sector. As mentioned earlier, non-performing loans in Central Africa are almost 10 percentage points higher than any other region and are especially high in Equatorial Guinea (51%), where high levels of public sector arrears had translated into very high NPL ratios, São Tomé and Príncipe (29%) and Chad (26%). While non-performing loans increased in 2020 due to the pandemic, four countries saw their NPL ratios decrease in 2021 (Congo: -5 percentage points; Gabon: -5 percentage points; São Tomé and Príncipe: -5 percentage points; and Central African Republic: -1 percentage point), but this is at least partly related to a temporary relaxation of prudential measures, which has extended into mid-2022. Capital adequacy also differs substantially across the region. Within the Central African Economic and Monetary Community (CEMAC), regulatory capital stood at 14.1% in the second quarter of 2021, which is above the prudentially mandated minimum of 9.5%, but less than half of banks comply with regulatory capital requirements, according to the IMF. In the first half of 2021, the ratio of capital to risk-weighted assets remained negative (-5%) in Equatorial Guinea, reflecting restructuring and recapitalisation needs in the banking sector. Capital to risk-weighted assets was highest in the Central African Republic at 24% and in the Democratic Republic of the Congo at 22%, but it declined overall compared to the previous year.

Increasing concentration risks and high levels of arrears weigh on CEMAC banks' balance sheets. Risks to financial stability in the region remain heightened by the strong concentration of banks' exposure to large companies as well as the strengthening sovereign–bank nexus, reflected in an increase in the share of government debt on banks' balance sheets to almost 30% of total assets by mid-2021, according to the IMF. Financial stability is further undermined by the high levels of domestic arrears that erode asset quality and profitability.

Figure 29. Plans for operations and funding in the next 12 months (% of responding banks), Central Africa



Source: EIB Banking in Africa survey, 2022.

Of the six banks in Central Africa that completed the 2022 Banking in Africa survey, five reported that they "certainly" planned to expand their activities over the next 12 months, while one would "probably" increase funding (Figure 29). In comparison, last year, all seven banks in the survey expected to increase their activities. All banks in the 2022 survey specified that they "certainly" planned to increase funding in local currency. However, there is less appetite for expanding foreign currency funding in the next 12 months, with just two banks reporting that they will "certainly" do so, and three banks answering "definitely not." The more mixed results for foreign currency lending do not come as a surprise: the currency of the CEMAC region, the CFA franc, is pegged to the euro, and foreign currency lending is almost absent in those markets. In contrast, the banking system of

the Democratic Republic of the Congo is almost entirely dollarised (almost 90% of loans were denominated in a foreign currency in the first quarter of 2021).[15]

Small and medium-sized enterprises' credit demand is expected to increase over the next 12 months, while banks plan to tighten credit standards. Four of the five banks (80%) in Central Africa that reported lending to SMEs expect increased demand for credit in local currency from small and medium firms over the next 12 months. Only one bank (20%) anticipates an increase in these firms' foreign currency demand, while the rest did not reply or considered foreign currency lending "not relevant" (Figure 30). When it comes to credit standards in the region, four out of the six banks in our survey replied that they had tightened standards in the past 12 months, whereas two had eased them. Last year, only one bank planned to tighten standards, so the actual tightening of standards was more significant than expected. Looking forward, three Central African banks said they would "moderately" tighten their credit standards further, and only one expects to ease them (Figure 31). Although the sample of Central African banks is small, it might illustrate that the previous optimism about the post-pandemic environment has been replaced by heightened uncertainty about the global and regional economic outlook in the context of the war in Ukraine and the related sharp rise in commodity prices.

Figure 30. Expected change in demand for credit from SMEs (% of responding banks), Central Africa

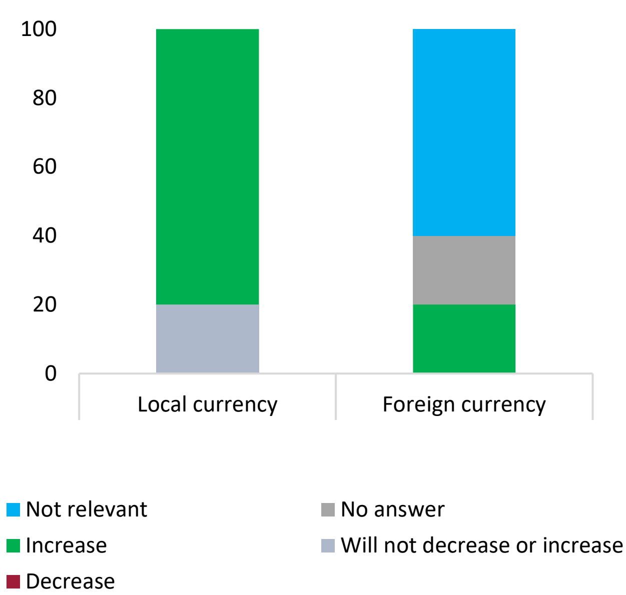
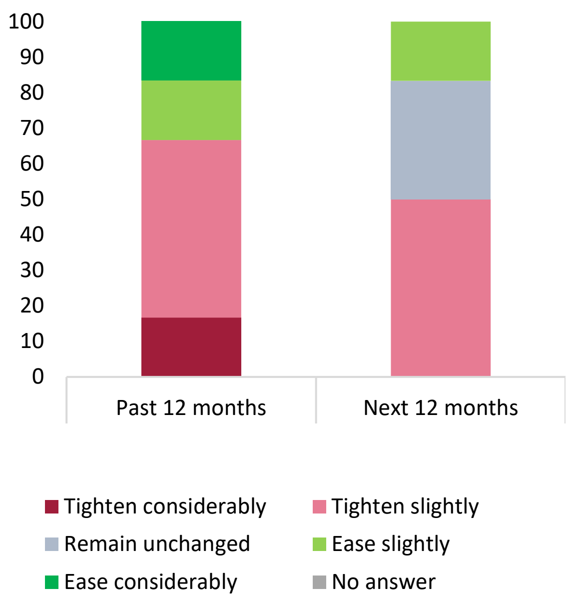


Figure 31. How credit standards have changed/will change (% of responding banks), Central Africa

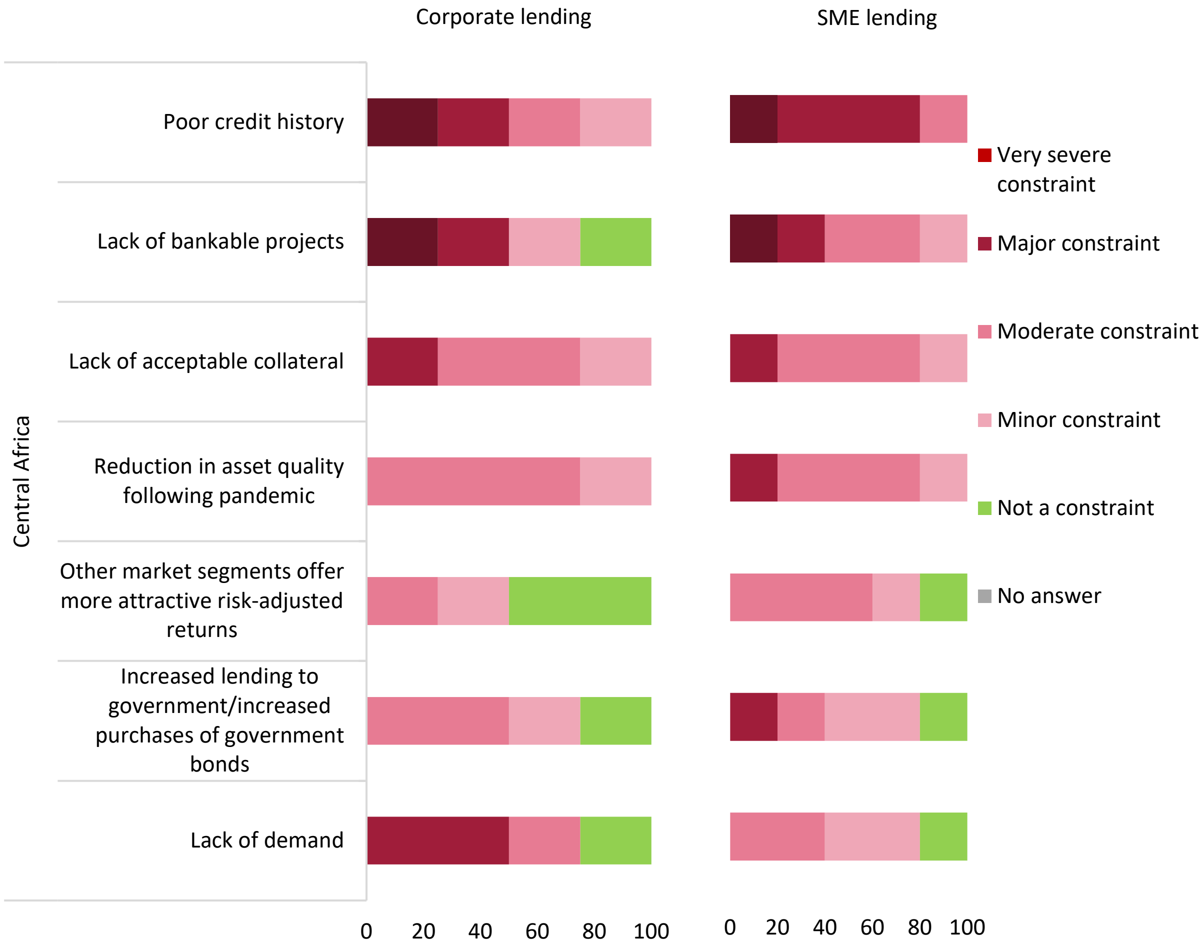


Source: EIB Banking in Africa survey, 2022.

Poor credit history and a lack of bankable projects are the main constraints on credit supply for Central African corporates and small and medium-sized enterprises, while concerns about small businesses lacking collateral seem to have eased somewhat. Corporates' poor credit history is seen as a major or very severe constraint by half (50%) of the banks that responded to this part of the survey (Figure 32). This number increases to 80% when it comes to small and medium firms. A lack of bankable projects is a major or very severe constraint for 50% of corporates and 40% of small and medium firms, illustrating that the continued lack of diversification and underdevelopment of the non-oil economy hampers development in many countries in the region. Small firms' lack of acceptable collateral was a major constraint for more than half of the Central African banks last year, but this seems to be less of an issue in the current round, with only 20% reporting it as a major constraint. For corporates, this trend seems to be reversed, with 25% of banks considering insufficient collateral as a major issue, whereas last year, all banks in our survey reported it to be only a minor or moderate factor. The reduction of lending constraints in Central Africa depends on the post-COVID-19 economic recovery, the clearance of payment arrears, the reduction of non-performing loans and the successful implementation of measures to strengthen financial inclusion and increase diversification.

[15] IMF Staff Country Report, available at: https://www.imf.org/en/Publications/CR/Issues/2021/07/28/Democratic-Republic-of-the-Congo-Request-for-a-Three-Year-Arrangement-Under-the-Extended-462901.

Figure 32. Factors constraining credit supply (% of responding banks), Central Africa



Source: EIB Banking in Africa survey, 2022.

Banking in East Africa

Based on average concentrations across the seven countries in the sub-region, East Africa is more competitive than the Southern and Central sub-regions but less so than the West. East Africa has a total of 142 banks, according to the latest Moody's Analytics BankFocus data (Table A3 in the Appendix), and the third lowest banking sector concentration among Africa's sub-regions, as measured by the weighted average of the share of assets held by the three largest banks. This relatively high level of competition is driven by Kenya and to a lesser extent Tanzania and Uganda, which have relatively low market concentration and a larger numbers of banks. Burundi, Djibouti and Ethiopia remain the most concentrated markets, each with a smaller number of banks.

The level of development of credit markets varies across the sub-region (Figure 33). Kenya has the most developed and extensive financial sector in East Africa, with a share of credit to GDP at 32%, which is above the regional weighted average (23%), and 40% of banks' total assets (Moody's Analytics BankFocus) for the region. Moreover, in 2021, 79% of the Kenyan population had an account at a bank or another type of financial institution or used a mobile money service, while this share stands at 55% for the whole of sub-Saharan Africa.[16] Conversely, Ethiopia, Tanzania and Uganda continue to have the lowest credit to GDP ratios at below 15%. In addition, while average credit growth is close to 12% in nominal terms at the sub-regional level, the most recent

[16] Global Findex database, available at: https://databank.worldbank.org/reports.aspx?source=1228.

figures for credit growth (2021) also show divergent trends. Specifically, Burundi and Ethiopia posted annual growth close to 20%, whereas credit expanded by 10% or less in Djibouti, Kenya, Tanzania and Uganda. Despite this recent solid credit growth, loan-to-deposit ratios still stand below 100% in all countries despite some regional differences, with a weighted regional average of 72%. This low ratio indicates that the risks of overheating remain limited.

Figure 33. Credit as % of GDP and annual credit growth, East Africa

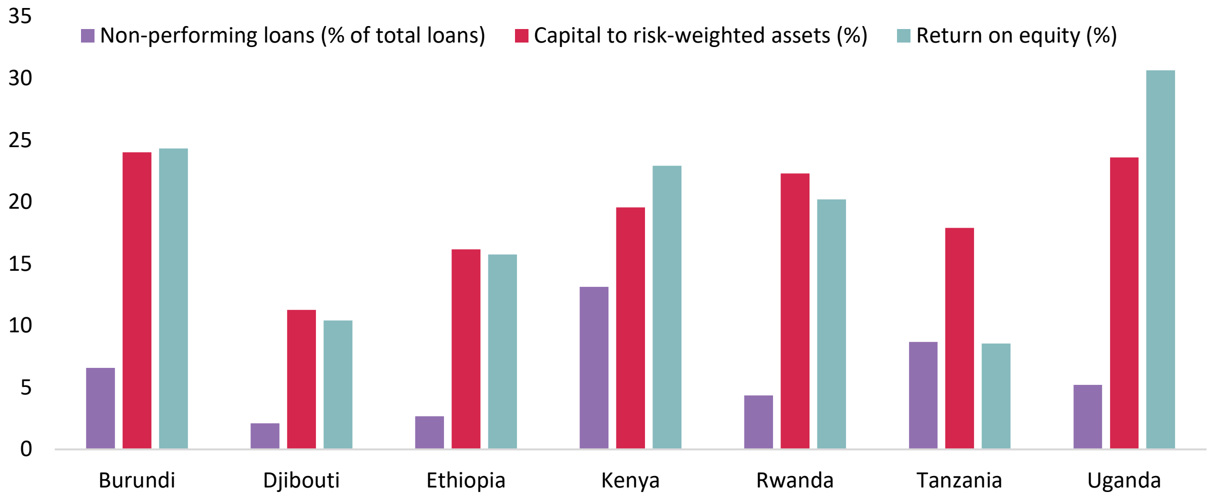


Source: World Bank and Moody's Analytics BankFocus.

Stability and soundness indicators suggest that the banking sectors of East African countries have been resilient to the COVID-19 shock and remain well placed to withstand the current economic shock (Figure 34). The IMF reports that Kenya showed remarkable resilience to the shock caused by the COVID-19 crisis and is staging an economic recovery, as is Rwanda, which has a positive economic outlook that suggests its recovery will continue in 2022. Other economies, like Ethiopia's, have yet to overcome the shocks experienced over the past two and a half years that have dampened growth, increased inflation and worsened fiscal and external pressures.[17] The weighted average capital adequacy ratio for the region is close to 19%, with only Djibouti reporting an aggregate ratio below 15%. In some countries (Burundi, Kenya, Rwanda and Uganda), total capital accounts for over 20% of risk-weighted assets. Profitability remains solid — particularly for a sub-region where inflation remains relatively under control — with an average return on equity of 19%. Djibouti and Tanzania display the weakest profitability, with average returns on equity of 10% and 9%, respectively. Asset quality varies across countries, reflecting differences in policy measures implemented during the pandemic as well as different situations predating the crisis. In mid-2021, the ratio of non-performing loans to total credit averaged 8% in East Africa and was over 13% in Kenya but 5% or less in Ethiopia, Djibouti, Rwanda and Uganda. Construction and agriculture, particularly in the countries most affected by droughts and locust plagues, remain the sectors with the highest share of non-performing loans.

[17] Kenya Article IV, available at: https://www.imf.org/en/Publications/CR/Issues/2021/12/22/Kenya-2021-Article-IV-Consultation-Second-Reviews-Under-the-Extended-Arrangement-Under-the-511263; Rwanda Article IV, available at: https://www.imf.org/en/Publications/CR/Issues/2022/01/13/Rwanda-2021-Article-IV-Consultation-and-Fifth-Review-Under-the-Policy-Coordination-511923; Ethiopia press release no. 22/216, available at: https://www.imf.org/en/News/Articles/2022/06/21/pr22216-ethiopia-imf-staff-visit-discusses-reform-plans-and-economic-developments-in-ethiopia.

Figure 34. Solvency, profitability and asset quality indicators, East Africa

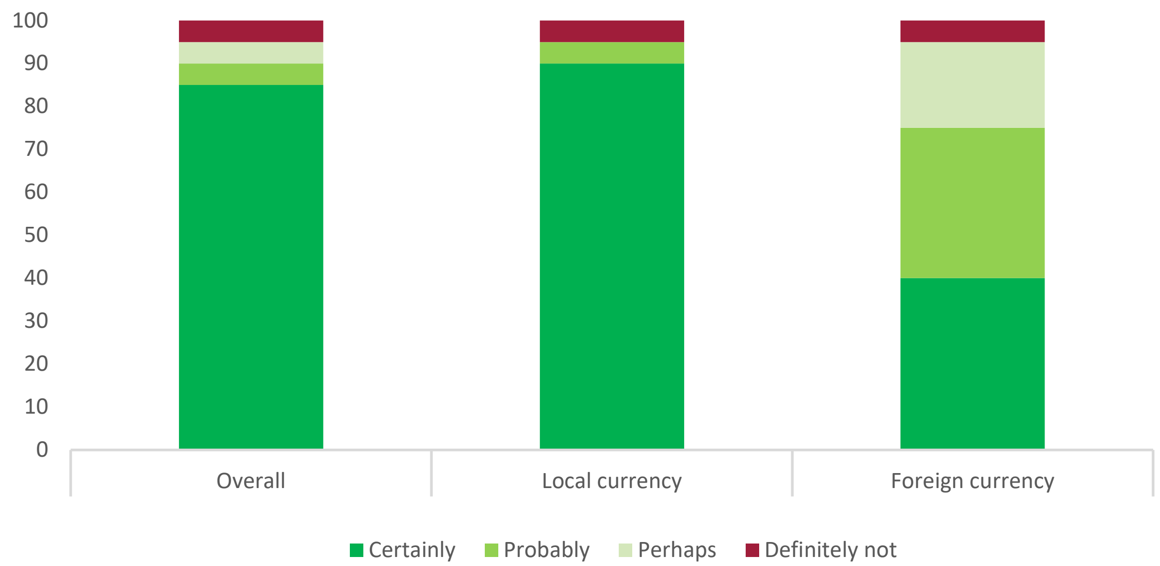


Source: IMF, World Bank and Moody's Analytics BankFocus.

Central banks, governments and supervisors in East Africa started to unwind the measures implemented to offset the impact of the coronavirus pandemic. The measures implemented in 2020 and 2021 included increases in liquidity provisioning, channelled to the sectors more seriously affected by the pandemic, and policy rate cuts by most central banks, with the exception of the National Bank of Ethiopia, which left its policy rate unchanged during the crisis. The governments of Uganda and Rwanda also provided public guarantees for loans to corporates and small and medium firms in the most affected sectors, such as tourism. In addition, national regulators in Uganda and Tanzania approved loan moratoriums, which ended after summer 2021. As of mid-2022, public guarantees and moratoriums are no longer in place and non-performing loans have not yet increased, suggesting that they were effective in preventing a deterioration in asset quality due to the impact of the coronavirus pandemic.

Going forward, of the 25 East African banks that responded to the 2022 European Investment Bank's Banking in Africa survey, 85% expect to increase their overall funding, which is more than in other sub-regions and more than in 2021 (Figure 35). Nevertheless, this expansion is expected to be more pronounced in local currency (90% of respondents planning or considering an increase) than in foreign currency (40%).

Figure 35. Funding plans over the next 12 months (% of responding banks), East Africa



Source: EIB Banking in Africa survey, 2022.

Credit demand, particularly from small and medium-sized enterprises, is also expected to increase, but banks will remain relatively cautious (Figure 36 and Figure 37). Banks are expecting increased demand for loans in both foreign and local currency, although more marked for the former. However, as in the 2021 edition of the survey, when asked about planned changes to credit standards, banks reported that they may not be ready to fully accommodate an increase in demand. Although East African banks expect to marginally relax credit standards relative to 2021 (when standards were tightened by over 50% and eased by less than 30% of survey respondents), they do not project a major loosening. The proportion of banks expecting to ease their credit standards over the next 12 months (35%) is only marginally higher than the proportion expecting to tighten them (30%), implying not only that the impact of the COVID-19 shock on lending conditions persisted for longer than expected one year ago but also that the current economic shock might be hampering credit conditions.

Figure 36. Expected change in credit demand from SMEs over the next year (% of responding banks), East Africa

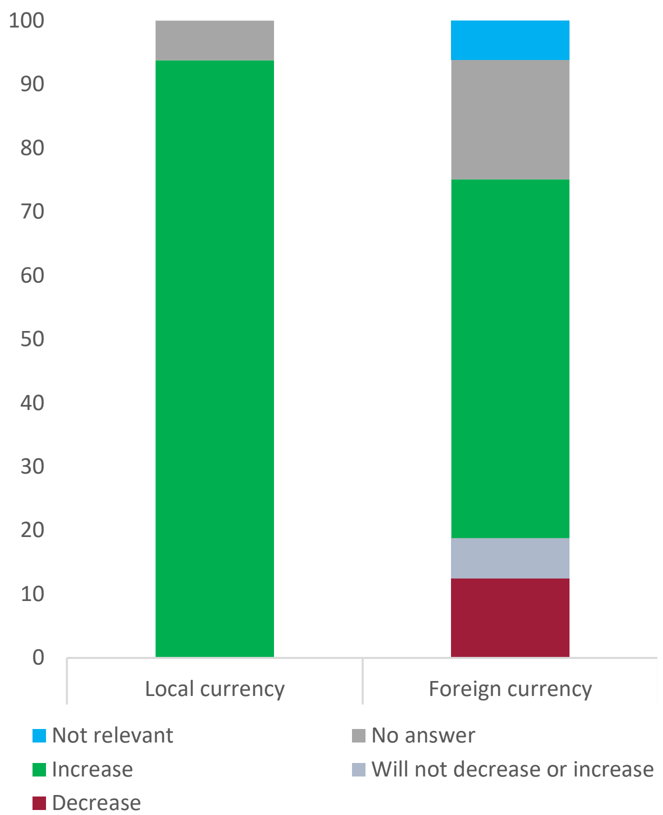
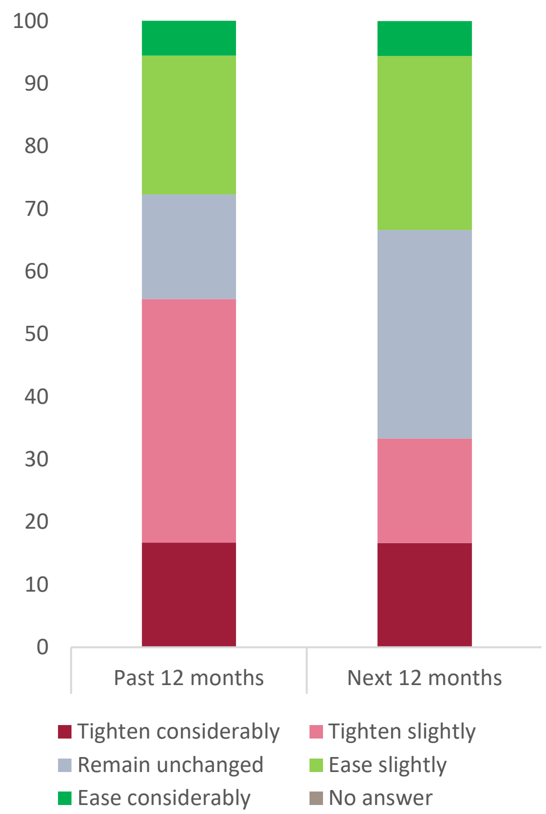


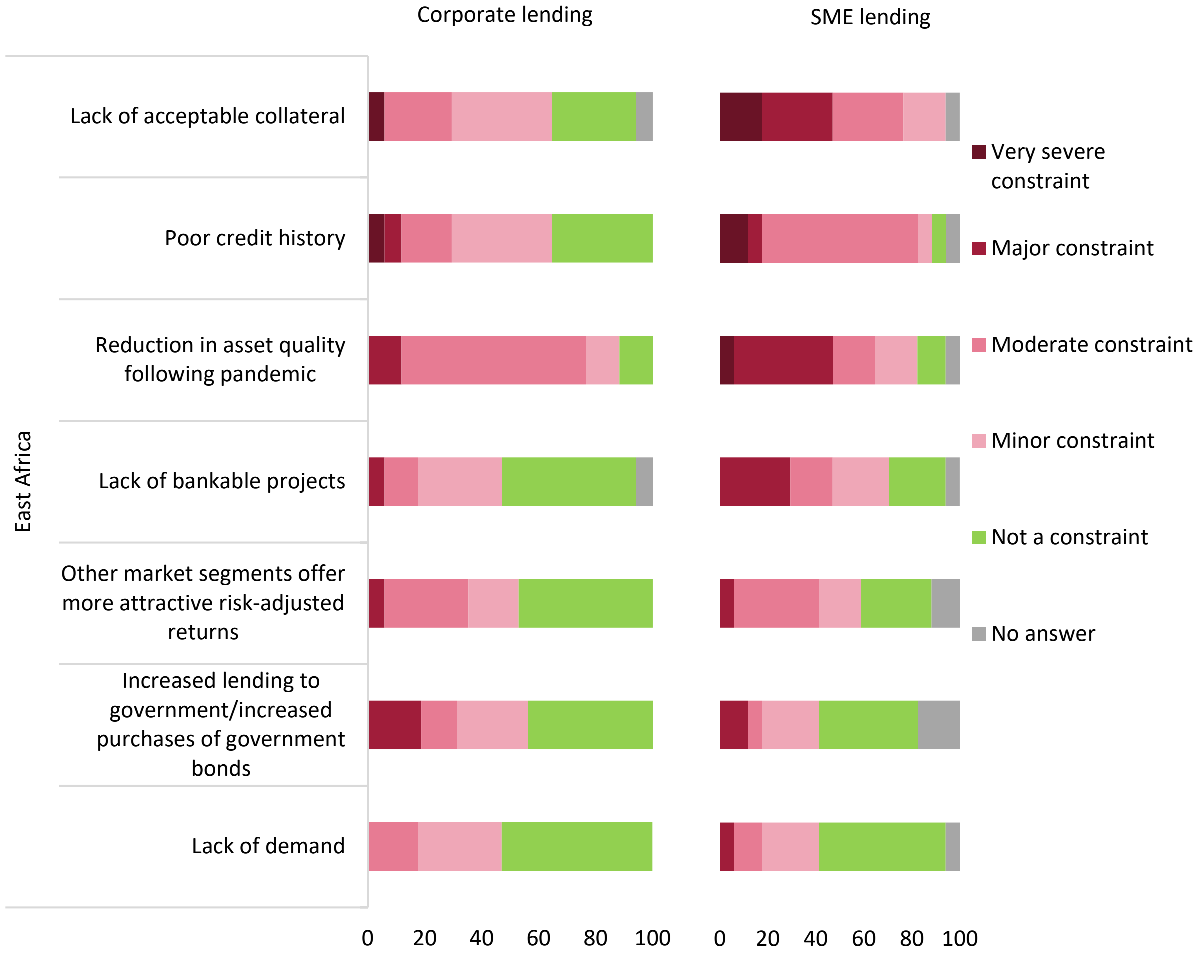
Figure 37. Expected change in credit standards over the next 12 months (% of responding banks), East Africa



Source: EIB Banking in Africa survey, 2022.

The main factors constraining credit supply to corporates and small and medium enterprises remain the lack of acceptable collateral and poor credit history (Figure 38). Both are structural, demand-side factors, suggesting that normal credit growth might resume once the economic impact of the pandemic and the current economic shock fade. Still, this also implies that more structural policy measures might be needed to improve credit supply to companies, particularly small and medium businesses. This need will likely be even stronger if the current economic crisis leads to a global recession and exacerbates these constraints at the firm level.

Figure 38. Factors constraining credit supply (% of responding banks), East Africa



Source: EIB Banking in Africa survey, 2022.

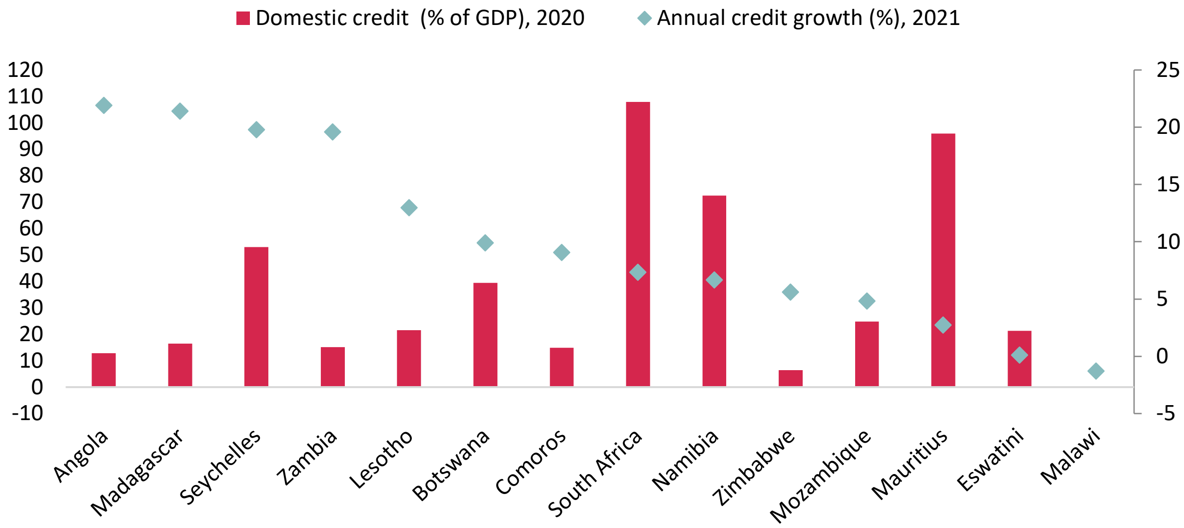
Banking in Southern Africa

The banking sector in Southern Africa[18] **is among the most developed of the continent, but differences exist across countries**. While the financial sectors of Mauritius and South Africa are broad-based and integrated with the global financial system, the other Southern African countries' banking sectors remain small, and domestic credit as a share of GDP is still low (Figure 39). Banks from South Africa are active throughout the region and beyond, often raising the bar in terms of standards for domestic banks. In terms of banking concentration, this is very high in South Africa, where the share of assets in the hands of the top three banks is 99.5%, whereas it is much less concentrated in the rest of the region. In Mauritius, the domestic banking sector is also relatively concentrated, with the four largest banks holding 55% of bank assets and the two largest banks accounting for 60% of domestic lending and deposits. While sound, the banking sector in Mauritius is vulnerable to external economic shocks and is dependent on a small number of economic sectors (tourism, construction and real estate). Mauritius is also actively trying to change its image from an offshore tax haven to a financing hub, focusing particularly on serving Africa. In Zimbabwe, the economic downturn and very high inflation (85.8% as of April 2022) increased the financial system's vulnerabilities. Angola, despite benefiting from the rise in

[18] Southern Africa includes 14 countries with very different economic structures: Seven are classified as emerging market and middle-income (Angola, Botswana, Eswatini, Mauritius, Namibia, Seychelles and South Africa), while the other seven have low-income developing country status (Comoros, Lesotho, Madagascar, Malawi, Mozambique, Zambia and Zimbabwe). Additionally, Comoros is also classified as a fragile state. Some of the countries in the region are rich in mineral resources and all of them, except Angola, are net oil and gas importers.

commodity prices, most notably oil and gas, is plagued by high inflation (in 2021, the GDP deflator was above 35%), which is also fuelled by accommodative monetary policies. In Zambia, progress on debt restructuring has been slow, but with China now part of the negotiations, prospects for a resolution are improving, which could help to underpin renewed investment inflows for large capital projects. While the public finances remain challenging, the country has a current account surplus thanks to a strong trade balance from copper exports.

Figure 39. Credit depth and credit growth (2020), Southern Africa (%)

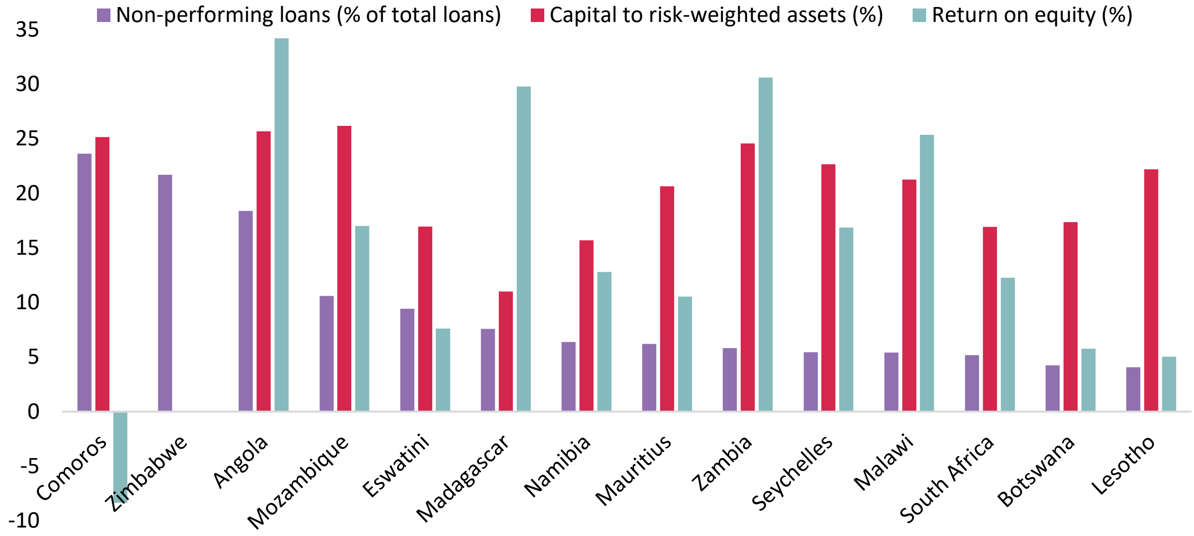


Source: World Bank and Moody's Analytics BankFocus.
Note: Credit growth for Zimbabwe is in real terms.

Banks in Southern Africa overall are well capitalised but remain vulnerable to external shocks and tightening conditions. In 2020, banks entered the COVID-19 crisis relatively well capitalised and with relatively good profitability and asset quality, based on standard indicators (Figure 40 and 2021 Finance in Africa report). This has helped them withstand lower profitability during the pandemic. Several country-specific developments and policy measures in 2021 further mitigated the impact of the crisis on capital ratios. For example, net interest margins held up better than expected in South Africa, where regulatory adjustments to the treatment of loans — restructured because of COVID-19 — reduced the amount of capital required to be held for provisioning. In Mauritius, the financial sector, including the global business companies segment, was stable in 2021.[19] Non-performing loans stood at around 5.8% in December 2021, half a percentage point lower than a year earlier. As of the end of 2021, the banking sector overall remained well capitalised and above the regulatory thresholds. The country is also no longer on the European Union's list of high-risk third countries or the Financial Action Task Force's lists of jurisdictions under increased monitoring after having implemented measures to tackle strategic deficiencies regarding anti-money laundering/combating the financing of terrorism (AML/CFT). In Zambia, the downgrade of sovereign external debt to default status caused accounting losses, while the government continues to service its local currency debt. The large public debt (more than 100% of GDP) and deteriorated economic situation is weighing on the private sector's ability to service its debt. However, the impact was mitigated by excluding the sovereign paper held by banks from the default; banks are still facing contingent risk through their sovereign paper holdings. All in all, the Southern African banking sector remains relatively well capitalised and with a low level of non-performing loans (Figure 40), except in Angola, Comoros, Mozambique and Zimbabwe, where they are above 11%.

[19] A global business company is a company engaged in a qualified global business from within Mauritius with persons who are all residents outside of Mauritius and where business is conducted in a currency other than the Mauritian rupee.

Figure 40. Solvency, profitability and asset quality indicators (2021) (in %), Southern Africa



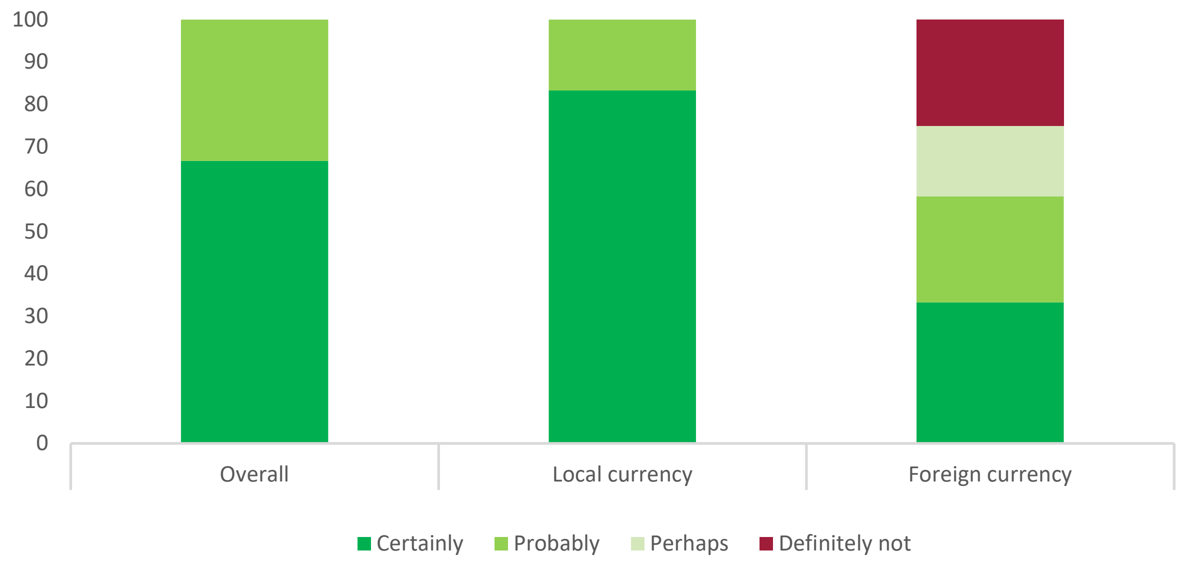
Source: IMF, World Bank and Moody's Analytics BankFocus.

The rise in interest rates in Southern Africa prompted by higher inflation and the global risk-off sentiment triggered by the Russian invasion of Ukraine have major implications for the banking sector. With corporate balance sheets still weak due to the pandemic, the prospects of a global slowdown — if not outright recession in advanced economies — is likely to push various Southern African companies' income statements into the red. Companies operating in tourism are on the frontline, but companies in export-facing sectors, which have benefited from the global surge in growth after the pandemic, will face a far more challenging environment. While higher interest rates may benefit banks via wider interest margins, there can be negative effects too: (i) lower valuation of fixed-income securities, resulting in investment losses; (ii) weaker demand for new loans and (iii) higher non-performing loan ratios, which had already increased during 2020. On the monetary policy side, higher and persistent inflation and rising interest rates in advanced economies have prompted all but a few central banks in Southern African countries to react. The South African Reserve Bank has, since November 2021, raised its policy rate by a cumulative 125 basis points as of the end of May 2022, followed by Botswana, Lesotho and Eswatini, albeit to a lesser extent so far. Countries in the region where interest rates have been kept constant in 2022, such as Angola and Zambia, are experiencing higher inflation, exchange rate depreciation and capital outflows, especially in the current risk-off global environment characterised by high uncertainty. However, Zambia is a special case, and many of these developments stem from the debt crisis.

The banking sector in Zimbabwe stands out in many respects. It has survived decades of economic hardship through a combination of conservative risk management and sometimes capital injections from (South African) parent banks. Banks have had to deal with hyperinflation, large exchange rate devaluations, multiple currencies, foreign exchange scarcity and changes in monetary policy practices. After being kept low for a long time, the policy rate was hiked significantly over several steps, reaching 80% in April 2022. While this is high by any standard, with inflation exceeding 85%, real interest rates are negative to support credit demand.

Banks in the region remain sanguine about business prospects but are expecting to rely more on operations and funding in local currency. Around two-thirds of banks plan to increase operations in the next 12 months (Figure 41), especially in local currency, which is broadly unchanged from a year earlier. No bank anticipates reducing their level of activity. All banks are expecting to raise funding in local currency, whereas last year, this was the case for only 70% of the banks that replied to the survey. On the other hand, as in the previous version of the survey, only about 60% of banks responded that they are "certainly" or "probably" doing so in foreign currency. Moreover, one out of four banks are ruling foreign currency funding out.

Figure 41. Plans for operations and funding in the next 12 months (% of responding banks), Southern Africa



Source: EIB Banking in Africa survey, 2022.

While banks expect an uptick in demand for credit, they also expect credit supply to tighten, especially for small and medium-sized enterprises. Just over 80% of banks expect credit demand to go up in local currency (Figure 42). Broadly reflecting their funding plans, almost 40% of banks also expect demand in foreign currency to increase. Banks, however, have split opinions on how credit standards and related supply will be affected (Figure 43). While almost 20% expect an easing, close to 40% of banks expect tighter standards. These percentages reflect a bit more caution when compared to the 2021 survey, when 20% of banks also expected an easing of standards but less than 30% foresaw a tightening of standards. However, the tightening of lending standards in Southern Africa over the last 12 months was notably smaller than in other regions, so while there is additional caution, it is coming from a low baseline.

Figure 42. Expected change in demand for credit from SMEs (% of responding banks), Southern Africa

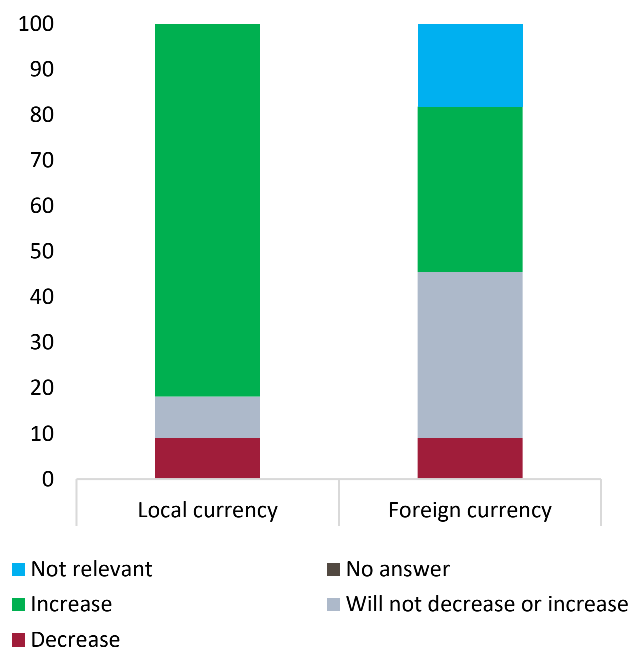
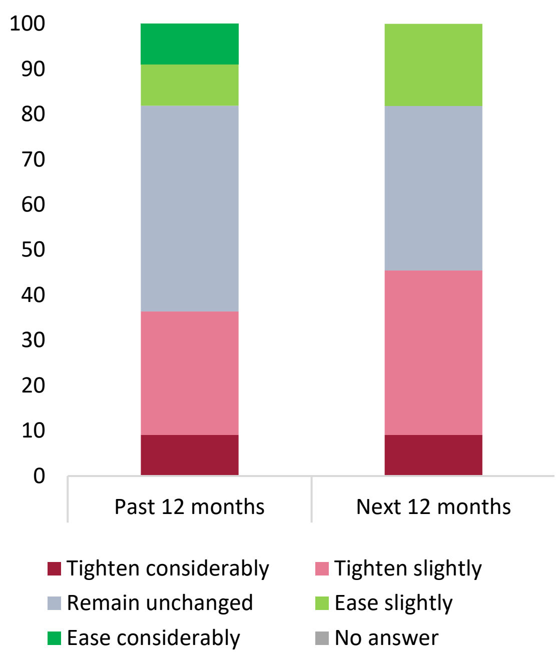


Figure 43. How credit standards have changed/will change (% of responding banks), Southern Africa



Source: EIB Banking in Africa survey, 2022.

Banks report a tightening of credit supply, especially for small and medium-sized enterprises, in the 12 months prior to the survey (Figure 44). More than 70% of reporting banks agree that four major credit constraints — lack of acceptable collateral, poor credit history, reduction in asset quality and lack of bankable projects — limited credit supply. As in previous years, some of these factors (lack of acceptable collateral and poor credit history) are structural in nature rather than cyclical and are reported to be greater constraints on SME lending than on corporate lending, suggesting that small and medium firms continue to have less access to finance in Southern Africa. Lack of good collateral is a more pressing problem in Southern Africa, where 36% of respondents see it as a "very severe constraint" and another 36% as a "major constraint," whereas banks in the other regions mostly view it as a "major" or "moderate" constraint.

Figure 44. Factors constraining credit supply (% of responding banks), Southern Africa



Source: EIB Banking in Africa survey, 2022.

Scaling up financing for women-owned firms: Evidence from the 2022 Banking in Africa survey

Women-led businesses in sub-Saharan Africa still account for less than 15% of total enterprises, according to the World Bank Enterprise survey (various years).[20] Access to finance is key to enabling startups to flourish and companies to grow, but women remain particularly disadvantaged. According to the 2021 World Bank Global Findex,[21] on average, 53% of adults have a bank account across sub-Saharan African countries (excluding high-income economies). Women-owned accounts have experienced strong growth in the last decade and now make up half of all accounts in sub-Saharan African countries. In 2011, women-owned accounts represented only 17% of accounts across sub-Saharan Africa. Against this backdrop, the SME Finance Forum estimated 52% of women-owned micro, small and medium enterprises in sub-Saharan Africa are financially constrained, which is 10 percentage points higher than the average observed in developing countries. Overall, the formal finance gap for women-owned micro, small and medium enterprises in the region is estimated at $48 billion.

There are a number of factors hindering women-owned businesses' access to finance in the region, including informality, perceived higher risk and high collateral requirements and interest rates. According to the 2022 World Bank Group Women, Business and the Law database, gender discrimination is still present in 18 countries in the region in laws on accessing credit or in how men and women can open a bank account. A recent study from the African Development Bank also highlights that self-selection bias plays a role in gender gap financing across Africa. In fact, the probability of not applying for a loan because a person "did not think it would be approved" is three times higher among female managers than their male peers.[22] Evidence from banks surveyed by the European Investment Bank seems to confirm some of these challenges while shedding light on the opportunities that financing women-owned businesses can offer.

Banks across the region are stepping up efforts to increase access to finance for women. 70% of the banks surveyed have a gender strategy in place and sponsor women and gender-focused initiatives in the community (Figure 45), representing an increase of 10 percentage points on the 2021 survey. Furthermore, 59% of banks offer financial services and products that focus on women. Looking at the funding side, women account for less than 40% of deposit holders in fewer than 40% of banks. Close to 40% of banks surveyed offer or plan to offer preferential requirements and rates when lending to women in an attempt to ease supply-side constraints associated with credit rationing.[23] The 2022 Finance in Africa survey dispels misconceptions related to women and asset quality. In fact, almost 30% of banks surveyed observed no differences in default and non-performing loan rates between men and women portfolios. In addition, four in ten banks found that NPL rates for women-led businesses are lower than the average NPL rates of their loan portfolios (Figure 47). In their sample of banking clients, the International Finance Corporation observed that non-performing loans for women-led small and medium firms stood at 4.6% of the total loan portfolio, versus 5.3% non-performing loans observed on the total portfolio (Schnabel J., Pulizzi H., 2021). These figures confirm the opportunities and benefits that financial inclusion for women can bring about.

[20] https://www.enterprisesurveys.org/en/enterprisesurveys.
[21] https://www.worldbank.org/en/publication/globalfindex/interactive-executive-summary-visualization.
[22] https://www.afdb.org/en/documents/working-paper-317-women-self-selection-out-credit-market-africa.
[23] https://www.imf.org/Publications/fandd/issues/2020/03/africa-gender-gap-access-to-finance-morsy.

Figure 45. Gender strategies in place (% of responding banks):



Figure 46. What percentage of deposit accounts (# of accounts and volumes) are held by women?

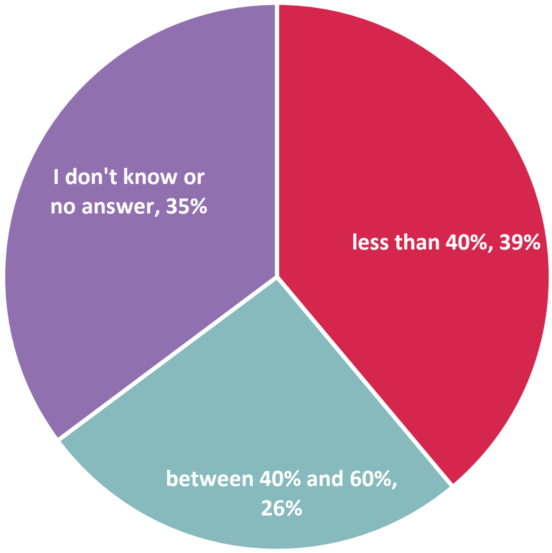
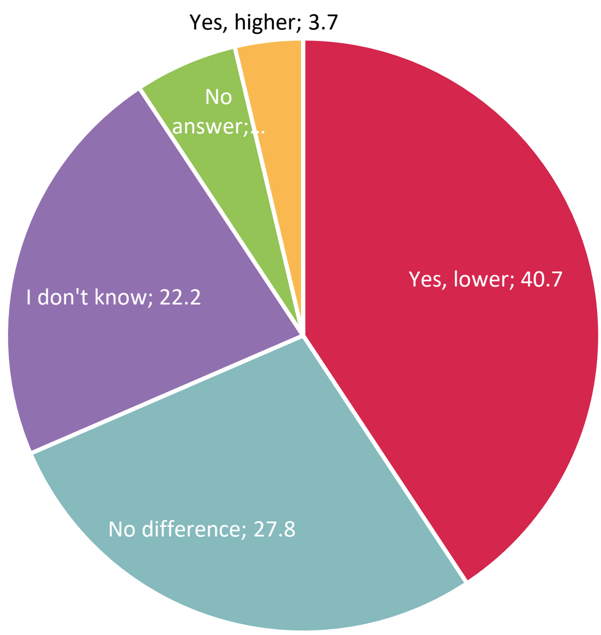
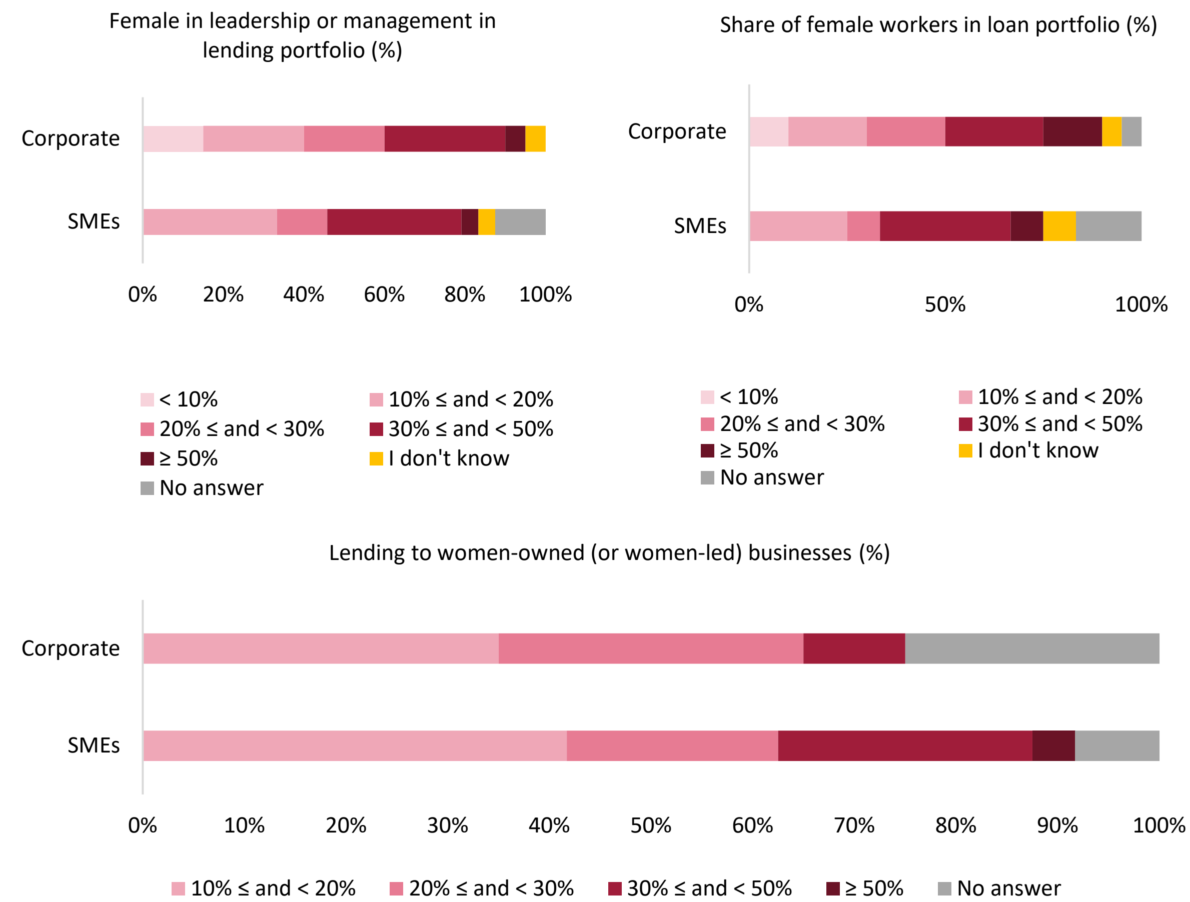


Figure 47. Does the rate of non-performing loans to women or women-led businesses differ from the average NPL rate?



Less than half of the 54 banks surveyed collect gender-disaggregated data on their loan portfolios, highlighting the need to strengthen data collection and analysis to build evidence and knowledge. Looking at the businesses they support, a majority of companies are male led and feature higher proportions of male employees. This is particularly true for corporates, with the majority of banks observing women in leadership and/or senior management positions in less than 30% of their loan portfolios. Overall, over 60% of banks declared that less than 30% of their lending goes to women-led businesses (Figure 48).

Figure 48. Composition of loan portfolio



Fostering the adoption of digital services remains a priority for many financial institutions. According to 40% of banks surveyed, there is no digital gender divide in the use of their services, but almost one-third of the banks surveyed indicated that men are more likely to use the digital services they offer compared to women. This is in line with the 2021 Findex, which found that women are 7 percentage points more likely than men to need help using their mobile money account. Inexperienced account owners who must ask a family member or a banking agent for help using an account may be more vulnerable to financial abuse. This impedes women from fully contributing to increased private sector development and improved economic opportunities.

The European Investment Bank is committed to helping fill an estimated $1.7 trillion financing gap worldwide for micro, small and medium-sized businesses owned and run by women. As the first multilateral development bank 2X Challenge member, EIB Global has mobilised more than €2 billion in gender-lens investing since the beginning of the initiative in late 2019, providing African women with better access to finance, as well as dedicated coaching and tailored services and products, thereby unlocking much-needed business and social transformation potential.

In 2019, the European Investment Bank launched SheInvest, an initiative to boost women's economic empowerment in Africa by mobilising $1 billion of gender-responsive investments compliant with the 2X criteria.[24] In just over a year, the European Investment Bank provided credit lines via local banks in Uganda, Senegal and Benin that will benefit female-led small enterprises. But lending is only one side of the equation. Via its technical assistance programme, the African Women Rising Initiative, the European Investment Bank supports financial intermediaries in designing, establishing and actively promoting financial services better tailored to the needs of women entrepreneurs.[25]

[24] https://www.2xchallenge.org/criteria.
[25] For more information on the activities of the European Investment Bank in Africa, including those with a gender focus, please see Chapter 6.

Microfinance institutions

The crisis generated by the coronavirus pandemic severely increased the financial difficulties faced by households, with an even greater negative impact on the poorest.[26] This worsened the prospects of many people on low wages who usually access finance via microfinance institutions, increasing their dependence on informal channels at an often higher cost.

Financial service providers in the microfinance sector typically work with households and micro-enterprises that are usually excluded from traditional commercial banking services (IEG, 2015). Microfinance can be provided by an array of different institutions, which, in Africa, range from non-bank institutions such as cooperatives and NGOs to formal microfinance institutions and commercial banks — and increasingly digital financial services providers — united by the aim of reaching an underserved or excluded market of typically small borrowers. Around the world, more than 140 million borrowers rely on microfinance providers.[27] Sub-Saharan Africa has been the main global recipient of financial inclusion funding in the past decade. More precisely, in 2019, for the first time, sub-Saharan Africa received more funding than any other region, with $7.6 billion[28] in active commitments, representing around 30% of international financial inclusion projects.

As a result of the pandemic, in 2020, sub-Saharan microfinance institutions showed a 1.9% annual decline in the number of borrowers, although the size of the MFI portfolio grew by 5% (Figures 49 and 50).[29] The decrease in borrowers — while relatively contained — compared unfavourably with the rest of world, which witnessed a 1% increase in the number of customers and 8% growth in gross loan portfolios in 2020. MFI activity staged a significant recovery in sub-Saharan Africa in 2021, with strong growth in both borrower numbers and loan portfolios. By the end of 2021, the cumulative portfolio growth since 2019 was well ahead of other global regions, expanding by 30% compared to a global average of 24%. The growth in portfolio size in sub-Saharan Africa is based on a slightly lower overall increase in borrower numbers with respect to other regions (5.6% of cumulative growth for sub-Saharan Africa vs. 7.3%), meaning that loan size has also grown more quickly in sub-Saharan Africa. However, early indications from the first half of 2022 suggest a deterioration in gross loan portfolios for sub-Saharan microfinance institutions and almost no change in the pool of borrowers, but the data are extremely preliminary at this point.

Figure 49. Cumulative growth in average number of borrowers, 2019–2021 (in %)

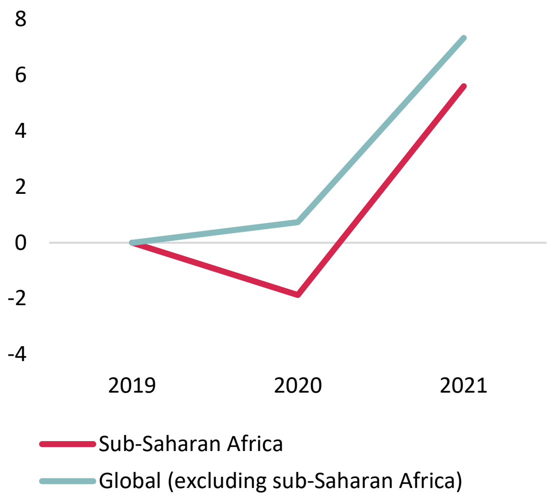
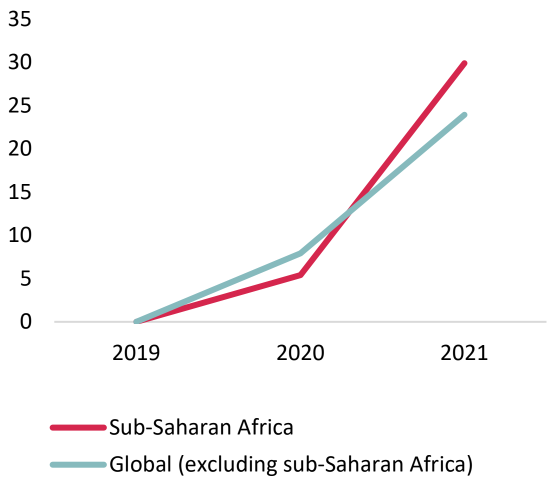


Figure 50. Cumulative growth in gross loan portfolios, 2019–2021 (in %)



Source: ATLAS.

[26] See Chapter 1 for statistics on increases in poverty due to COVID-19.
[27] https://internationalbanker.com/finance/how-covid-19-is-affecting-microfinance/.
[28] https://www.cgap.org/blog/africa-top-recipient-financial-inclusion-funding.
[29] https://www.atlasdata.org.

As reported by the Consultative Group to Assist the Poor (CGAP, 2021), the coronavirus pandemic increased the solvency risks faced by microfinance service providers. The path towards recovery will be gradual, with sub-Saharan African microfinance institutions facing greater pressure on asset quality compared to similar financial services providers in other parts of the world. As shown in Figure 51, PAR 30, which measures loans in arrears for more than 30 days, has deteriorated more quickly in sub-Saharan Africa than other regions since 2019. This ongoing pressure on sub-Saharan African microfinance portfolios is particularly severe for the smallest and medium-sized institutions (also known as Tier 2 and Tier 3). On average, Tier 2 and Tier 3 microfinance providers' lack of sufficient capital to cope with the effects of the crisis and access to new shareholder support have been hindered by weaker financial metrics (CGAP, 2021), as these firms generally have an inconsistent track record in terms of generating returns for shareholders. Figure 52 breaks down 2020 data, the latest year for which comprehensive data are available by MFI size, and it reveals portfolio quality is worse for smaller microfinance institutions. Moreover, this problem is again more pronounced in sub-Saharan Africa compared to elsewhere.

Figure 51. PAR 30, 2019–2021 (in %)

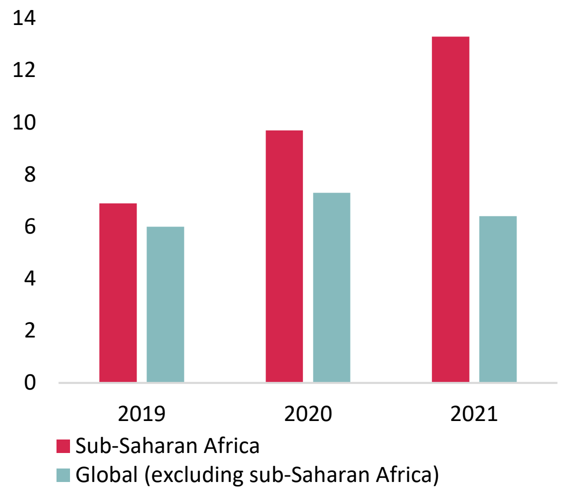
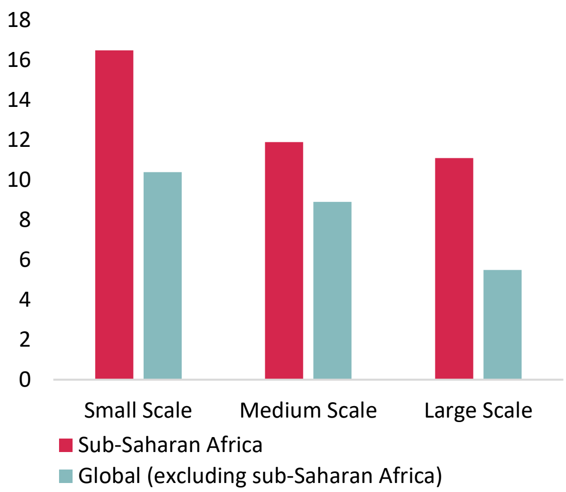


Figure 52. PAR 30, 2020 by scale (in %)

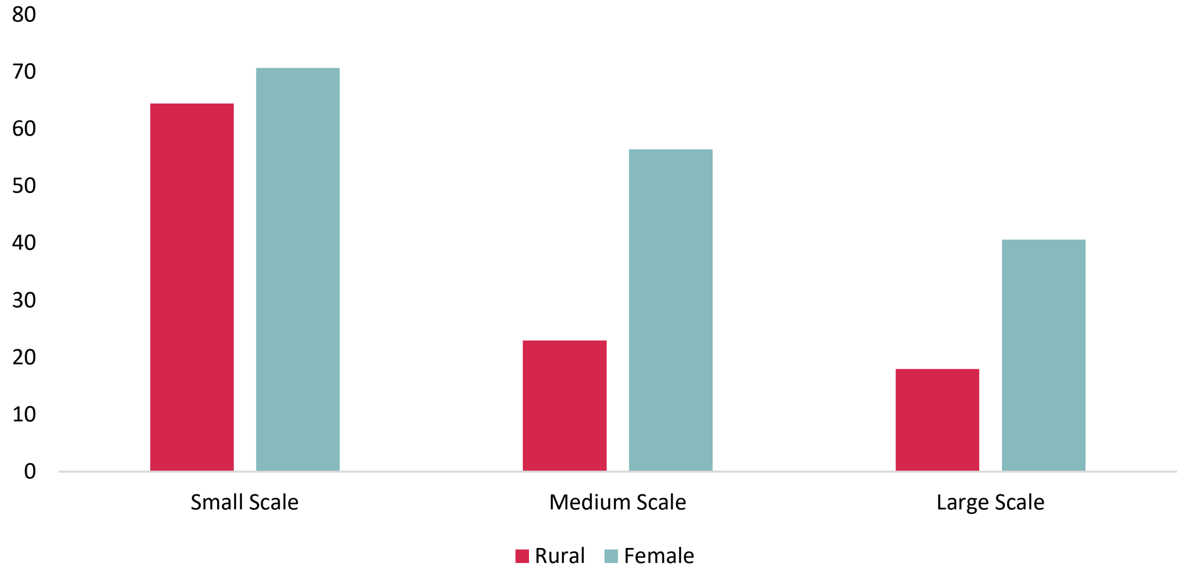


Source: ATLAS.
Note: Scale of microfinance institutions defined according to total assets: small: total assets < $10 million; medium: total assets $10–100 million; large: total assets > $100 million.

Low capitalisation, combined with some debt forbearance measures required by regulators for microfinance clients but often not for microfinance providers themselves, exacerbated the pressure on the finances of providers of all tiers. However, while MFI liquidity remains a concern for a segment of financial institutions, maintaining the solvency of providers at risk (Tier 2 and Tier 3) is likely to become the most relevant problem to solve in the short term. Given their inability to offer financial returns of the same magnitude as their positive social impact returns, they suffer from a clear risk of persistent stagnation in growth and possible failures. These could have a severe effect on their final customers, especially in the case of no replacement by other microfinance providers. Furthermore, in countries with a large share of microfinance institutions, this could constitute a structural threat to the whole microfinance sector and also trigger a risk of contagion, even into wider local banking and financial sectors.

The solvency and credit risk issues facing Tier 2 and Tier 3 microfinance institutions are linked to their efforts to serve poorer populations. Over the past two decades, many microfinance institutions have strengthened their ability to reach underserved segments and have contributed to the financial empowerment of women. Among microfinance institutions of all tiers, Tier 2 and Tier 3 institutions have been found to have a deeper reach in their communities. More than 60% of borrowers from small-sized institutions live in rural areas, and 70% are female customers (Figure 53). The solvency problems facing these microfinance institutions deserve attention because their failure would reverse many of the gains made in financial inclusion over the last decade. Beyond helping to eradicate poverty, microfinance institutions also address "non-material" poverty by overcoming social and cultural constraints that prevent people from realising their potential. Having a savings account and receiving training may increase the self-esteem and status of customers and empower them individually and collectively (Calgagovski et al., 2001).

Figure 53. Number of rural and female borrowers (in %), 2021: Sub-Saharan Africa



Source: ATLAS.

References

Attout, A., Baldini, A., de O. Schmidt, V. F., Guihy, J. and Zwart, S. (2022). "Will crowding out of private sector credit inhibit the economic recovery in Africa?" EIB Regional Study, forthcoming, Luxembourg.

Calgagovski, J., Gabor, V. and Germany, M. (2001). "Microfinance in Africa: Combining the Best Practices of Traditional and Modern Microfinance Approaches towards Poverty Eradication." Available at: https://www.un.org/esa/africa/microfinanceinafrica.pdf.

CGAP (2021). "COVID-19 briefing, Microfinance Solvency and COVID-19: A Call for Coordination." Available at: https://www.cgap.org/research/covid-19-briefing/microfinance-solvency-and-covid-19-call-coordination.

Cherif M. and Dreger, C. (2016). "Institutional determinants of financial development in MENA countries." *Review of Development Economics*, 20(3), pages 670-680.

de O. Schmidt, V. F. and Zwart, S. (2018). "Ready for the Recovery? How Crowding Out by Public Debt Affects Lending to the Private Sector across Africa," in: "Banking in Africa: Delivering on Financial Inclusion, Supporting Financial Stability." European Investment Bank, Luxembourg.

EIB (2021). "Finance in Africa: for green, smart and inclusive private sector development." Available at: https://www.eib.org/en/publications/economic-report-finance-in-africa-green-smart-inclusive-private-sector-development.

Fitch Ratings. (2022). "Nigerian Banks Face Risks Despite Oil Boost." Available for subscribers at: https://www.fitchratings.com/research/banks/nigerian-banks-face-risks-despite-oil-boost-26-05-2022.

IEG. (2015). "Microfinance: A Critical Literature Survey." IEG Working Paper 2015/No.4. Available at: https://openknowledge.worldbank.org/bitstream/handle/10986/23546/Microfinance000al0literature0survey.pdf.

IMF (2017). "Sub-Saharan Africa Regional Economic Outlook: Fiscal Adjustment and Economic Diversification." April. Available at: https://www.imf.org/en/Publications/REO/SSA/Issues/2017/10/19/sreo1017.

IMF (2022a). "Global Financial Stability Report — Shockwaves from the War in Ukraine Test the Financial System's Resilience." Washington, DC. April. Available at: https://www.imf.org/en/Publications/GFSR/Issues/2022/04/19/global-financial-stability-report-april-2022

IMF (2022b). "West African Economic and Monetary Union: Financial System Stability Assessment." Available at: https://www.imf.org/en/Publications/CR/Issues/2022/05/11/West-African-Economic-and-Monetary-Union-Financial-Sector-Assessment-ProgramFinancial-517823

IMF (2022c). "World Economic Outlook: War Sets Back the Global Recovery." Available at: https://www.imf.org/en/Publications/WEO/Issues/2022/04/19/world-economic-outlook-april-2022.

Schnabel J. and Pulizzi, H. (2021). "Banking on Women: Business Case Update 4. Lower NPLs for Women-Led SMEs." World Bank Group, Washington, DC. Available at: https://www.ifc.org/wps/wcm/connect/0e657775-6e3f-4e1d-8b3e-00b529216282/Banking+on+Women_NPLBusinessCaseUpdate_2021_FINAL.pdf?MOD=AJPERES&CVID=nTzCu.z

Appendix: Tables

Table A1. Key banking sector indicators, West Africa

Country	Number of banks **	Total assets $ **	Banking concentration (top 3 banks)**	Domestic credit (% of GDP) 2020⁺	Annual credit growth (%)⁺	Loans to deposits (%)⁺	Financial Soundness Indicators: Latest available	Capital to risk-weighted assets (%)±	Return on equity (%)±	Non-performing loans (% of total loans) ±
The Gambia	6	726 858	71	8	23	19	2019	31	15	5
Ghana	35	30 076 268	31	11	21	42	2021	20	20	15
Guinea	10	2 429 944	57	9	20	50	2021	18	29	9
Nigeria	36	1.34E+08	48	12	18	59	Q3 2021	15	14	6
Benin	9	6 070 938	64	16	4	72				18
Burkina Faso	12	11 140 985	67	28	11	74				8
Cabo Verde	9	3 282 055	71	73	6	61				11
Guinea-Bissau	1	135 195	100	16	-17	90				8
Côte d'Ivoire	22	31 237 155	40	21	5	73				9
Liberia	7	924 448	72	17	7	82				24
Mali	12	9 602 545	52	26	12	95				11
Mauritania	15	2 621 451	56	23	8	97				26
Niger	8	2 791 814	60	12	8	101				16
Senegal	23	13 645 709	37	29	7	84				13
Sierra Leone	7	742 488	59	6	15	27				14
Togo	9	4 591 297	94	27	4	70				18
West Africa*	**221**	**2.55E+08**	**48**	**15**	**15**	**62**		**16**	**15**	**9**

*Source: **Moody's Analytics BankFocus, ⁺World Bank, ± IMF Financial Soundness Indicators (FSI).*
** GDP-weighted average.*

Table A2. Key banking sector indicators, Central Africa

Country	Number of banks **	Total assets $ **	Banking concentration (top 3 banks)**	Domestic credit (% of GDP) 2020⁺	Annual credit growth (%)⁺	Loans to deposits (%)⁺	Financial Soundness Indicators: Latest available	Capital to risk-weighted assets (%)±	Return on equity (%)±	Non-performing loans (% of total loans) ±
Gabon	6	4 559 195	85	13	-7	69	Q2 2021	17	23	8
Central African Republic	2	312 624	100	12	11	82	Q2 2021	24	9	13
Cameroon	12	1 150 4890	49	15	-2	83	Q2 2021	14	22	13
Congo	5	1 892 974	74	13	-7	86	Q2 2021	22	15	18
Democratic Republic of the Congo	13	10 099 458	67	7	26	36				19
Chad	5	1 313 867	70	9	-9	93	Q2 2021	7	-19	26
São Tomé and Príncipe	1	147 592	100	20	3	70				29
Equatorial Guinea	2	656 926	100	15	-3	155	Q2 2021	-5	-5	51
Central Africa*	**25**	**18 269 683**	**68**	**11**	**6**	**71**		**13**	**13**	**19**

*Source: **Moody's Analytics BankFocus, ⁺World Bank, ± IMF Financial Soundness Indicators (FSI).*
** GDP-weighted average.*

Table A3. Key banking sector indicators, East Africa

Country	Number of banks **	Total assets $ **	Banking concentration (top 3 banks)**	Domestic credit (% of GDP) 2020+	Annual credit growth (%)+	Loans to deposits (%)+	Financial Soundness Indicators: Latest available	Capital to risk-weighted assets (%)±	Return on equity (%)±	Non-performing loans (% of total loans) ±
Burundi	6	1 489 409	73	22	20	56	Q2 2018	24	24	7
Djibouti	5	2 078 473	82	20	8	29	2021	11	10	2
Ethiopia	17	4 121 075	72		19	58	2020	16	16	3
Kenya	45	49 927 036	37	32	10	81	2021	20	23	13
Rwanda	12	5 091 697	64	25	14	97	Q1 2021	22	20	4
Tanzania	34	15 343 828	55	13	6	79	Q1 2021	18	9	9
Uganda	23	9 224 215	49	14	10	67	2021	24	31	5
East Africa*	**142**	**124 275 733**	**54**	**23**	**12**	**72**		**19**	**19**	**8**

*Source: **Moody's Analytics BankFocus, +World Bank, ± IMF Financial Soundness Indicators (FSI).*
** GDP-weighted average.*

Table A4. Key banking sector indicators, Southern Africa

Country	Number of banks **	Total assets $ **	Banking concentration (top 3 banks)**	Domestic credit (% of GDP) 2020+	Annual credit growth (%)+	Loans to deposits (%)+	Financial Soundness Indicators: Latest available	Capital to risk-weighted assets (%)±	Return on equity (%)±	Non-performing loans (% of total loans) ±
Angola	24	31 895 698	57	13	22	40	2018	26	34	18
Botswana	11	11 857 159	48	39	10	76	2021	17	6	4
Comoros	1	46 024	100	15	9	65	2020	25	-8	24
Eswatini	5	1 744 179	79	21	0	75	Q2 2020	17	8	9
Lesotho	4	1 367 737	91	22	13	57	2021	22	5	4
Madagascar	8	3 430 595	74	16	21	74	2021	11	30	8
Mauritius	21	45 809 024	55	96	3	67	2021	21	11	6
Malawi	10	3 711 419	73		-1	52	2020	21	25	5
Mozambiqu	17	10 184 540	73	25	5	47	2021	26	17	11
Namibia	15	10 863 596	78	73	7	86	2021	16	13	6
Seychelles	4	1 265 796	93	53	20	41	2021	23	17	5
South Africa	48	363 097 106	62	108	7	98	Q1 2021	17	12	5
Zambia	22	14 508 644	65	15	20	42	2021	25	31	6
Zimbabwe	14	4 183 927	46	6	340	37				22
Southern Africa*	**204**	**503 965 444**	**62**	**80**	**26**	**81**		**19**	**16**	**8**

*Source: **Moody's Analytics BankFocus, +World Bank, ± IMF Financial Soundness Indicators (FSI).*
** GDP-weighted average.*

4

Accelerating the digital transformation

This chapter is authored by Alfredo Baldini of the European Investment Bank. The author gratefully acknowledges the comments of Colin Bermingham, Claudio Cali, Mihaljek Dubravko, Barbara Marchitto, Debora Revoltella and Ricardo Santos on earlier drafts. The author also gratefully acknowledges the contribution made by Rahul Shah of Tellimer Research, based on a Tellimer survey of digital financial services firms operating in Africa and the contribution of a box on financial inclusion for micro- and small enterprises by Sai Krishna Kumaraswamy of the Consultative Group for Assisting the Poor (CGAP).

Key messages

The entire digital financial services, or FinTech, ecosystem in Africa has experienced rapid growth. As of April 2022, there were more than 1 000 active companies, up from 450 in 2020. Of these, 80% are homegrown and 20% come from outside Africa. Payments and lending services are still the dominant products, but the sector has diversified. Key growth areas include software solutions and the use of blockchain technology. Nigeria is home to the largest number of firms with 24% of the companies sampled, South Africa is second at 20%, Kenya is third with 17% and Egypt ranks fourth with 9%. The impressive growth in FinTech penetration in Nigeria, the continent's largest economy and most populous country, may be due to a number of factors, including venture capital funding, high growth potential, a relatively small banking sector and a favourable regulatory environment. The strong development of the digital financial services sector was made possible by growing interest from venture capital firms in funding FinTech startups on the African continent.

Banks in sub-Saharan Africa offer many digital services to their clients, with the share of banks providing digital applications or services ranging from a minimum of 80% in Central Africa to more than 95% in West Africa. Domestic money transfers (87%), receiving payments from customers (85%) and paying bills or suppliers (79.6%) are the top three most requested services. Compared to 2021, the share of customer transactions via digital channels in the banking sector has increased. The retail sector is leading the integration of digital transactions, followed by the corporate sector and small and medium enterprises. Across customer groups, digital transactions are more common in middle-income countries than in low-income countries.

To further accelerate the digitalisation of financial services, almost nine out of ten banks surveyed across sub-Saharan Africa are investing in improving the digital skills of staff and management via dedicated training programmes. However, there are also constraints on increasing digitalisation, including the need to address concerns around cybersecurity and improve information technology infrastructure. Indeed, more than 74% of banks surveyed rank cybersecurity risks as the most common constraint across all regions.

Introduction

The African continent is home to 1.3 billion people with a median age under 20. Mobile phone penetration exceeds 40% of the total population.[1] In 2021, technology adoption in Africa grew faster than in many other world regions, and by 2025, the value of the internet economy could contribute up to 7% of Africa's gross domestic product (GDP), growing from $180 billion currently to $700 billion by 2050 (Google and IFC, 2020). In this context, the digital economy in Africa is set for high growth over the next decade, and the financial sector is spearheading this new reality with the rollout of digital financial services including digital banking. The digital financial services sector includes online banking, mobile banking, mobile wallets, contactless services, digital payments for remittances using online platforms, GSM networks and digital money using blockchain. Within the digital financial services sector, digital banking can be broadly defined as a regulated banking activity that delivers a wide range of banking products and services facilitated by electronic (online) platforms that are not operated by commercial banks.

This chapter presents new evidence on how the rollout of digital financial services continues to transform the traditional banking-dominated financial sector in Africa. To do so, we used our proprietary 2022 EIB Banking in Africa survey and analysed other research and data focusing on non-bank digital financial companies. The chapter also explains how the emerging business models in providing digital financial services are novel, distinct and have the potential to reduce costs for the consumer and advance financial inclusion in Africa.

Recent developments in the digital financial services ecosystem

The entire digital financial services ecosystem in Africa has experienced rapid growth. As of April 2022, there were more than 1 000 active companies, up from 450 in 2020.[2] Of these, 80% are homegrown and 20% come from outside Africa. The sector has also been diversifying in several business areas, ranging from key services, such as payments, lending and remittances, to new high-growth areas including software solutions, investech, insurtech and blockchain services.

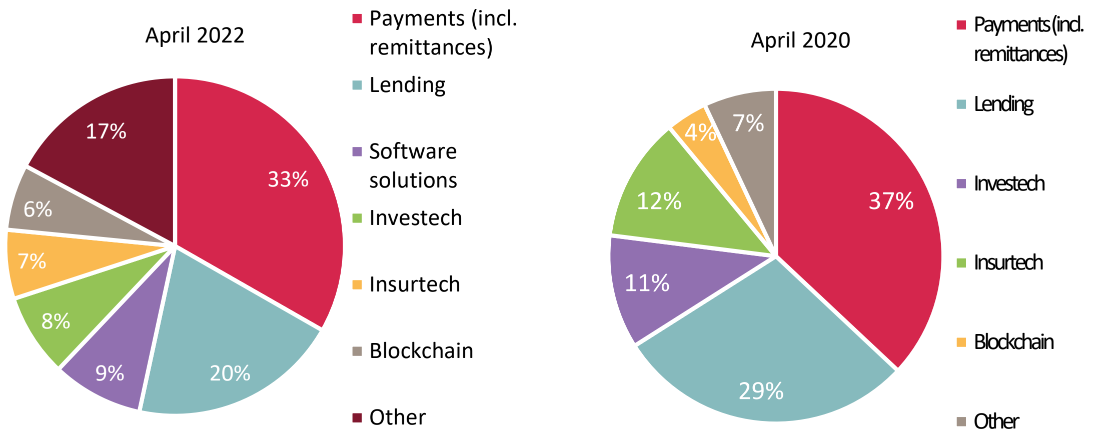
Product mix

Payments and lending services are still the dominant products, but the digital financial services sector has diversified towards others. In 2020, payments dominated the sector, with 37% of the firms in the sample focusing on this area. Lending was the second most popular product area (24%). Looking at the 2022 data, payments (including remittances) and lending remain the most important product areas, but their weight has decreased to 33% and 20%, respectively. Key growth areas include software solutions and the use of blockchain technology. Other products' (comprising a diverse mixture of areas, including cybersecurity and regtech) share of the pie has also grown. In short, Africa's digital financial services ecosystem has become more diverse.

[1] GSMA intelligence (2021) reports that by the end of 2020, 495 million people subscribed to mobile services in sub-Saharan countries, representing 46% of the region's population. GSMA estimates that the penetration will increase to 650 million subscribers by 2025 (50% ratio).

[2] We gratefully acknowledge the contribution to this section made by Rahul Shah of Tellimer Research, based on a Tellimer survey of digital financial services firms operating in Africa.

Figure 1. Africa's digital financial services by product area: April 2022 vs. April 2020

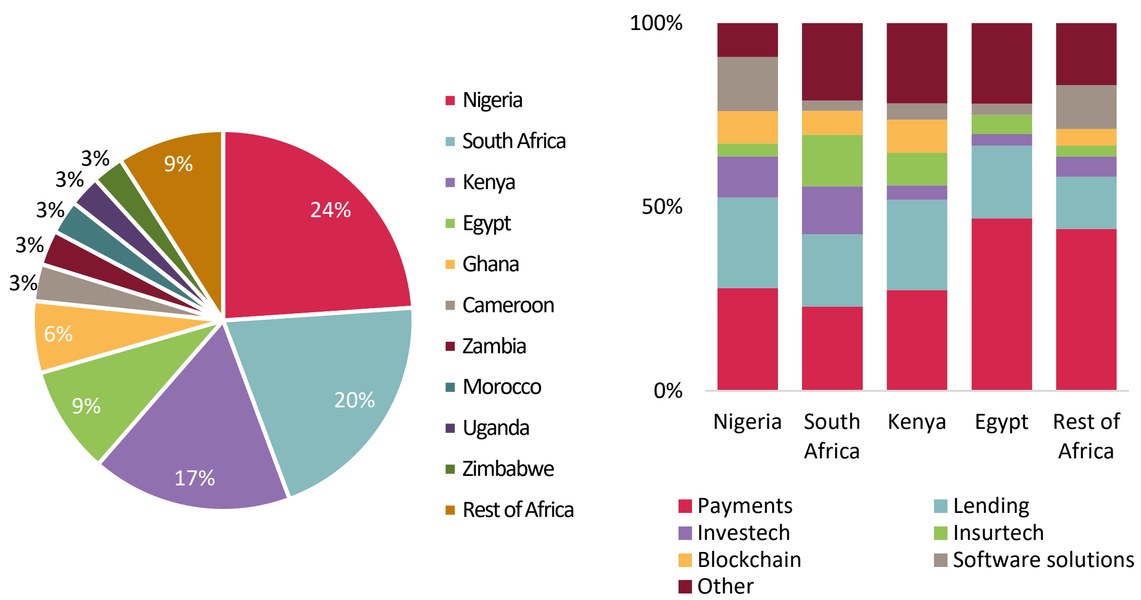


Source: Tellimer Research.
Note: The April 2022 chart is based on a sample of 1 049 African FinTechs, while the April 2020 chart is based on a sample of 450 African FinTechs.

Geographic mix: the big four and the role of funding FinTechs

In April 2022, four countries — Nigeria, South Africa, Kenya and Egypt — hosted 70% of FinTech operators in Africa (Figure 2, left panel).

Figure 2. Distribution of digital financial services in Africa by country and by product



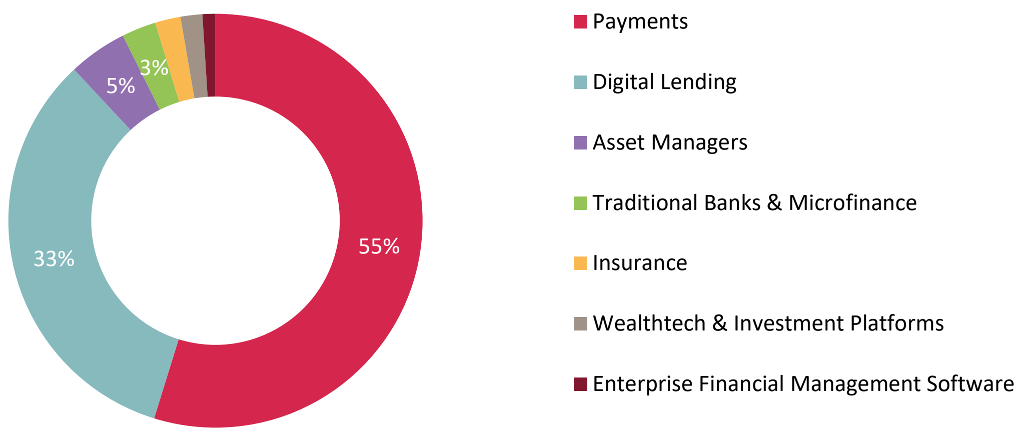
Source: Tellimer Research.
Note: Based on a sample of 1 049 African FinTechs as of April 2022.

In contrast to the previous survey of digital financial services conducted by Tellimer in April 2020, Nigeria is now the top country market with 24% of the companies sampled, South Africa is second at 20%, Kenya is third with 17% and Egypt ranks fourth with 9%. The impressive growth in FinTech penetration in Nigeria, the continent's largest economy and most populous country, may be due to a number of factors, including venture capital funding, high growth potential, a relatively small banking sector and a favourable regulatory environment.

South Africa's digital financial sector has benefited from the country's financial and capital markets infrastructure. The ubiquity of the Kenyan company M-Pesa has provided a transactional medium onto which other Kenyan digital financial services companies could latch. Most other markets have seen their share of the pie decline, since venture capital interest has been very focused on the larger markets. The product mix in these countries is similar, led largely by payments services and lending.

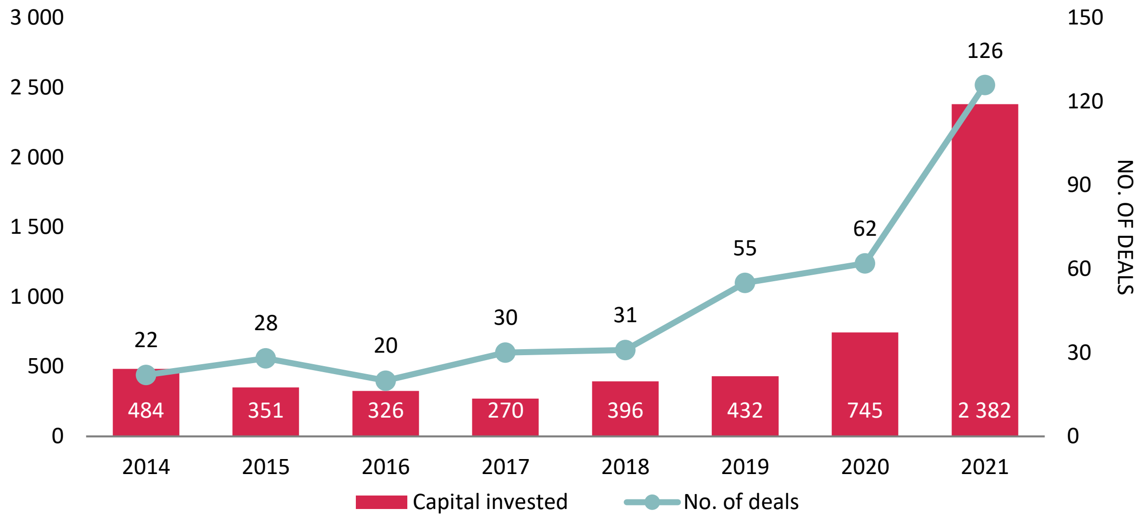
New FinTech platforms and traditional financial services companies are drawing record levels of capital led by venture capital deals for payments processors. The strong development of the digital financial services sector was made possible by the growing interest from venture capital firms in funding FinTech startups on the African continent. As Figures 3 and 4 show, according to GPCA research (GPCA, 2022), venture capital firms have invested up to $2.3 billion in 126 deals for African financial services companies, of which 55% ($1.3 billion) was in payments and 33% ($0.8 billion) in digital lending. Investment in 2021 grew rapidly from the $432 million invested in 2019 and the $745 million invested in 2020. Payment processors garnered over half of the capital invested in financial services companies in 2021, as COVID-19 has accelerated demand for digital transactions.

Figure 3. Africa financial services investment by focus area, 2021 (% of capital invested)



Source: GPCA. Data as of 31 December 2021.
Note: Includes FinTech software companies classified as "information technology" in GPCA's industry breakdown.

Figure 4. Africa financial services investment, 2014–2021 ($ million)

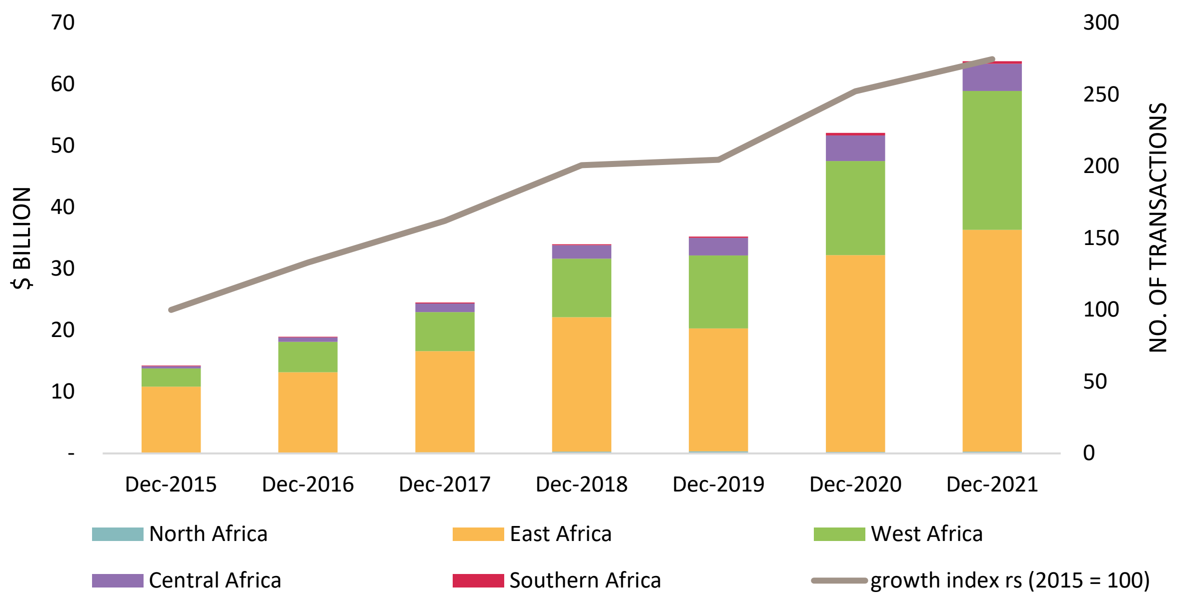


Source: GPCA. Data as of 31 December 2021.
Note: Includes FinTech software companies classified as "information technology" in GPCA's industry breakdown.

There was a sharp increase in financial services investment in continental Africa in 2021, both in terms of number of deals and the amount of capital invested (Figure 4). This increase in activity was driven by a sharp increase in venture capital investments and Nigeria has been the main hub geographically. According to the African Private Equity and Venture Capital Association (2022), 38% of these venture capital investments in Nigeria between 2014 and 2021 were in the financial sector. These investments included a $400 million Series C round in mobile money platform Opay (in a transaction that elevated the startup to unicorn status and a $2 billion market valuation), a $110 million Series B round in the business-to-business marketplace Trade Depot, as well as a $100 million Series A round in the payment app Palmpay. Four African payments unicorns were newly created in 2021: Opay (valued at $2 billion), Chipper Cash ($2 billion), Wave ($1.7 billion) and Flutterwave ($1 billion). Capital has continued to flow to payments platforms in 2022, as Flutterwave raised an additional $250 million in its Series D round, bringing its valuation up to $3 billion. South Africa, Kenya and Egypt have also attracted investments in the financial sector. These three countries attracted 30%, 23% and 13%, respectively, of the venture capital investment deal volume between 2014 and 2021.

Mobile money continues to play a key role in the development of digital financial services in Africa. Data provided by GSMA (2022) show that for the whole of 2021, the total mobile money transactions in the sub-Saharan African region increased by 42.4% in terms of value and by 33.6% in terms of volume (Table 1). In December 2021, the last monthly observation available, the total of mobile money transactions in US dollars increased by 22% compared to December 2020 (Figure 5). East Africa accounted for 56.5% of mobile money transactions in Africa in 2021, but growth was strongest in West Africa at 47%, driven by Nigeria. Together, these two sub-regions account for more than 90% of all the mobile money transactions on the continent. Their predominance in the African digital ecosystem can be explained by their large young and urban populations, the number of smart phone connections, and the presence of digital platforms run by mobile operators. In fact, sub-Saharan Africa accounted for 67% of all mobile money transactions globally by value in 2021 and 68% by volume (Table 1).

Figure 5. Mobile money transactions in Africa



Source: GSMA, 2022, and EIB staff calculations.

Table 1. Global and regional growth in mobile money transactions

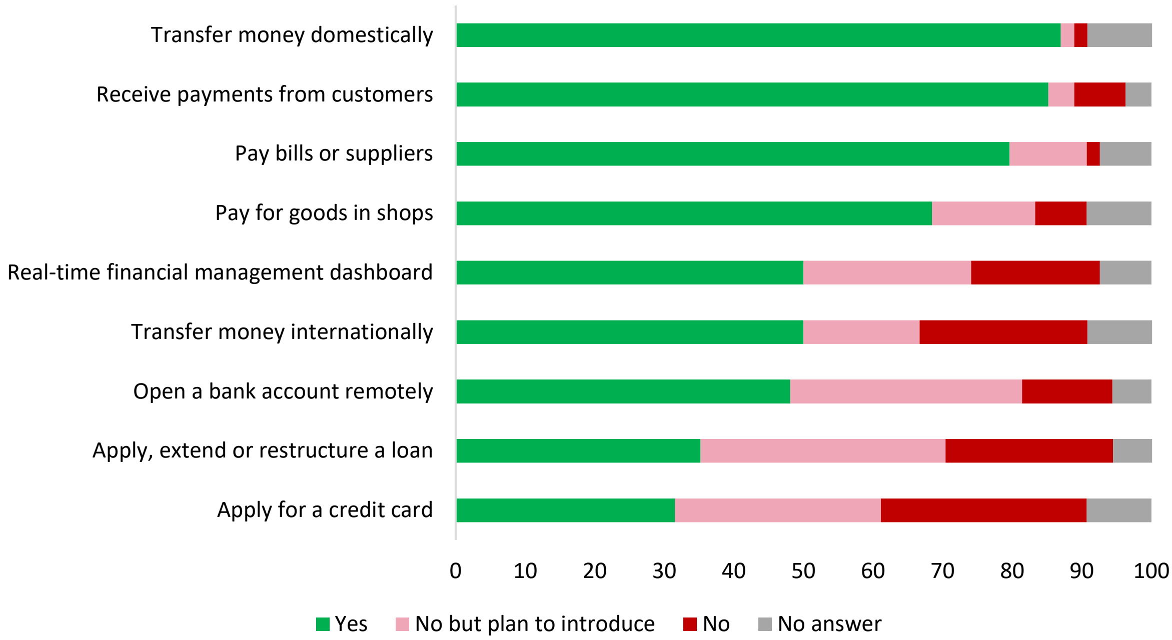
Sub-Saharan Africa	2020	2021	Chg. (%) y/y
Transaction volumes (billion)	27.4	36.6	33.6
Transaction value ($ billion)	490	697.7	42.4
East Asia and Pacific (excluding China)			
Transaction volumes (billion)	5.4	6.9	27.8
Transaction value ($ billion)	111	141.9	27.8
Latin America and Caribbean			
Transaction volumes (billion)	0.701	0.97	38.4
Transaction value ($ billion)	19.8	30	51.5
Middle East and North Africa			
Transaction volumes (billion)	0.146	0.242	65.8
Transaction value ($ billion)	10.5	13.7	30.5
South Asia			
Transaction volumes (billion)	7.5	8.9	18.7
Transaction value ($ billion)	131	156.3	19.3
Global			
Transaction volumes (billion)	41	54	30.3
Transaction value ($ billion)	762	1 040	36.4

Source: GSMA (2022), and EIB staff calculations.

Digitalisation in the traditional banking sector: survey results

Banks in sub-Saharan Africa offer many digital services to retail clients and to firms in support of economic activities. Within the region, the share of banks providing digital applications or services ranges from a minimum of 80% in Central Africa to more than 95% in West Africa (mostly driven by Nigeria), with East and Southern Africa falling somewhere in between. In the EIB Banking in Africa survey (2022), *provision of domestic money transfers* (87%), *receiving payments from customers* (85%) and *pay bills or suppliers* (79.6%) are the top three most requested services from survey respondents (Figure 6). This confirms the outcome of the 2021 survey and makes *receiving payments from customers* the second most important service, up by 10% compared to last year. The second most important group of digital financial services reported by sub-Saharan African banks includes *pay for goods in shops* (68%), *transfer money internationally* (50%) and a new category of digital financial services, *offering real-time financial management dashboard*, which is provided by half of the banks in the survey. In the bottom group of Figure 6, as in 2021, we find *apply for a loan* (35.2%) and *apply for a credit card* (31.5%), but the latter increased by about ten percentage points with respect to the previous year. Moreover, for these services, there is a large share of banks planning to offer them soon (about 30%), thus showing the high growth potential of digitalising these types of traditional banking services. Finally, the array of digital financial services offered by traditional banks continues to grow and the share of the banks not considering offering them (see the red bars in Figure 6) declined in five out of eight digital financial services categories considered in the survey, with respect to the previous year.

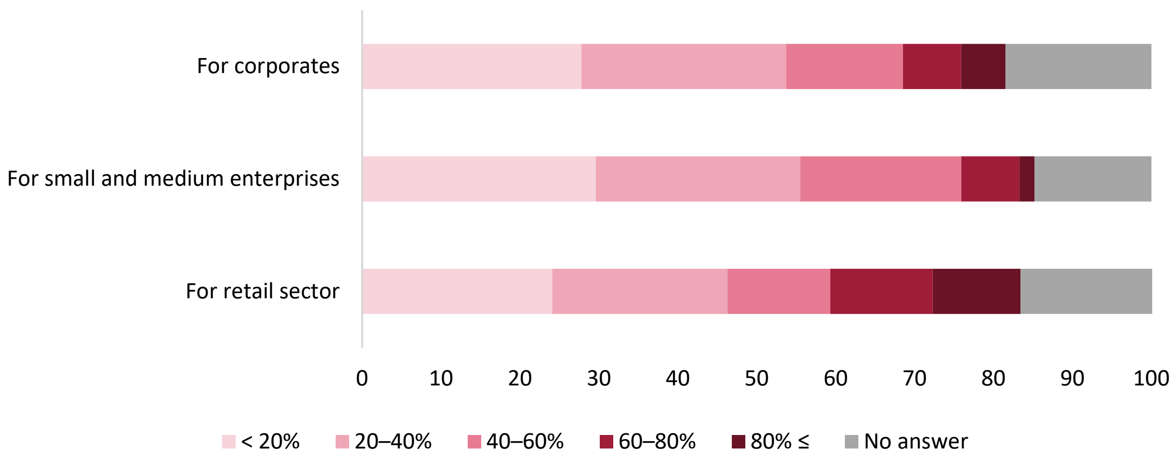
Figure 6. Provisions of digital financial services (% of banks surveyed)



Source: EIB Banking in Africa survey, 2022.

Compared to 2021, the share of customer transactions via digital channels in the banking sector has increased. As shown in Figure 7, the retail sector is leading the integration of digital transactions, with over 40% of transactions now digital for more than 37% of banks surveyed, followed by the corporate sector (> 40% of transactions for 30.7% of banks surveyed) and small and medium enterprises (> 40% of transactions for 26% of banks surveyed). Banks in West Africa report higher volumes of digital transactions, followed closely by East African banks. Across customer groups, digital transactions are more common in middle-income countries than in low-income countries, and regional differences exist. For example, while more than 50% of small and medium firms in Southern Africa conduct at least 40% of their transactions digitally, one-quarter of small and medium enterprises do the same in West Africa, one-third in East Africa and none in Central Africa.

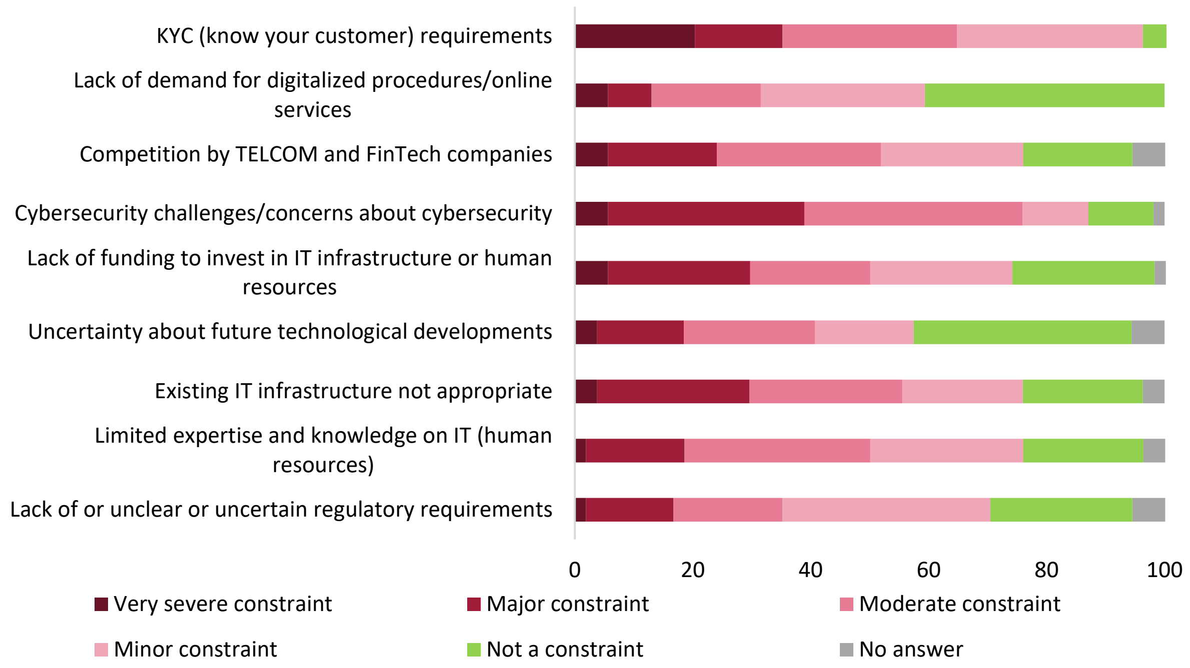
Figure 7. Customer transactions using digital channels



Source: EIB Banking in Africa survey, 2022.

To accelerate the digitalisation of financial services, almost nine out of ten banks surveyed across sub-Saharan Africa are investing in improving the digital skills of staff and management via dedicated training programmes. Banks are also prioritising investments in digital infrastructure and digital tools to support their strategies. However, there are also constraints on increasing digitalisation, including the need to address concerns around cybersecurity and improve information technology infrastructure. Indeed, more than 74% of banks surveyed rank cybersecurity risks as the most common constraint across all regions. Interestingly, know your customer requirements jumped to the second most important factor for 64% of banks surveyed. 55% of banks surveyed identify inadequate existing information technology infrastructure and 53% identify competition from telecom and FinTech companies as at least moderate constraints. Less than 50% of banks surveyed cite human resources in information technology or lack of funding as constraints. Finally, unclear regulatory requirements and a lack of demand and uncertainty over future technological developments are perceived as constraints by about 31% of banks.

Figure 8. Factors hinder adoption of further development of digitalisation



Source: EIB Banking in Africa survey, 2022.

Box 1: FinTech for micro and small enterprise finance

Micro and small enterprises are an important source of employment and resilience for low-income households in emerging and developing countries. Micro and small enterprises, defined as firms with fewer than 50 employees, are small, informal or semi-formal businesses that employ few people and are often cash-based. There are an estimated 487 million such companies in emerging markets, with 26% of them in sub-Saharan Africa alone (Dalberg, 2019). In developing economies, formal sector micro and small enterprises contribute to as much as half of net job creation (Ayyagari et al., 2014).

Among myriad other challenges, the lack of access to relevant and affordable finance constrains the stability and growth prospects of micro and small enterprises and renders the lives of those dependent on them financially vulnerable. Despite decades of efforts, the financing shortfall for these companies remains persistently high at around $4.9 trillion (IFC, 2017). The demand for small loan sizes, limited credit histories, insufficient or inaccurate data and lack of collateral make it expensive, risky and complex for traditional financial services providers to serve micro and small enterprises, leaving them underserved and excluded.

Technological advances are enabling solutions in the form of new digital business models with the potential to overcome these barriers (World Bank, 2020). This comes at an opportune time as many micro and small enterprises have gradually accelerated their embrace of digital technologies like social media, e-commerce platforms, digital invoices and purchase orders, mobile money and digital payments solutions, especially during the coronavirus pandemic.

This growing digitalisation positions micro and small enterprises to take advantage of the flexibility of digital financial services and accrue a range of benefits such as a lower borrowing costs, greater and easier access to finance, greater customisation and convenient bundling of services that can address both financial and non-financial needs, enhanced customer experience and improved data privacy and security.

Harnessing innovations like artificial intelligence, machine learning, application programming interfaces and big data analytics, a new wave of FinTech providers is able to use alternative digital data to underwrite loans, automate credit processes and combine finance with non-financial services to achieve lower operating costs, improve risk assessment and enhance product offerings.

The complexity of the FinTech landscape and the pace of providers' innovations can make it difficult to understand which business models are relevant for financial inclusion and what support they need. To help advance this learning agenda, Consultative Group to Assist the Poor (CGAP) research identified four FinTech models with high potential for reaching underserved and excluded micro and small enterprises:

1. **Data-driven lending** leverages improvements in data-generation methods to make better use of data on micro and small enterprises to improve the efficiency and risk management of lending. For example, data-driven lenders may use online transaction and purchase order data as proxies for cash flow, or use online information about companies to build behavioural credit scorecards for credit decisions. Data-driven lending takes many forms, including but not limited to:
    - **Merchant cash advances**, where providers extend credit in the form of upfront cash advances and collect repayment through automatic deductions from sales receipts, for example, KopoKopo and DPO Group.
    - **Factoring**, where providers collateralise invoices to provide credit, for example, Lidya and eFactor Network.
    - **Inventory and input financing** models, where credit assessments are made against digital purchase orders or online inventory data, for example, Wasoko and Sarafu.
    - **Unsecured business loan** models that provide collateral-free loans through either a high-touch approach relying on digitising paper documents and automated credit scoring through field staff or a low-touch approach using partner-provided digital transaction data and/or alternative data sources, for example, Aye Finance and Konfio.

2. **Embedded finance** models, where non-financial sector firms providing services like ridesharing, e-commerce, logistics, bookkeeping, etc., embed a financing component into their product offerings, either on their own balance sheet or through special purpose vehicles, or in partnership with financial service providers, for example, Mercado Pago, Khatabook, Bukuwarung, Azampay,etc.

3. **Peer-to-peer (P2P) lending** or platform/marketplace models that connect borrowers directly with both individual and institutional investors, enabling risk pooling, lower cost structures, more efficient underwriting and a greater choice and availability of credit, for example, Kiva and WeBank.

4. **Digital banking** models like neo banks/challenger banks where providers with banking licences adopt new technologies to offer more effective banking services through digital channels instead of physical branches (Jenik and Zetterli, 2020), for example, Tymebank, NuBank, Solarisbank, etc.

While the above FinTech models have the potential to expand access to finance for micro and small enterprises and advance financial inclusion, they face several obstacles in reaching their full potential. A broad range of issues exist, including concerns with data quality, providers' limited data analytics capabilities and low levels of digitalisation and low digital capacity of micro and small enterprises. At the ecosystem level, there is an uneven playing field for small, innovative providers and weak financial infrastructure, including low smartphone ownership, lack of functional interoperability and sparse cash-in/cash-out networks. Crucially, there is a need for enhanced customer protection measures to mitigate the risk of these innovations leading to predatory lending practices.

Addressing these challenges requires concerted efforts by various stakeholders in the sector. FinTech providers can specifically target the micro and small businesses by adapting existing models or developing new business models. Donors can support providers through patient capital, technical assistance and facilitating knowledge exchange. Investors — especially development finance institutes — can mobilise greater funding to target micro and small businesses, and regulators can foster an enabling environment that encourages innovation while also protecting customers from emerging risks.

(For more research on micro and small enterprise finance in the digital age, please see Consultative Group to Assist the Poor's programme on livelihoods and financial services. Available at: https://www.cgap.org/research).

How digital financial services are offered: ownership structure and business models

Digital financial services are currently offered in Africa by different types of entities reflecting different ownership structures, ranges of products and services, digital technologies and business models (Figure 9). These entities can be broadly classified as:

(i) Traditional commercial banks offering digital financial services through a dedicated branch or a subsidiary.

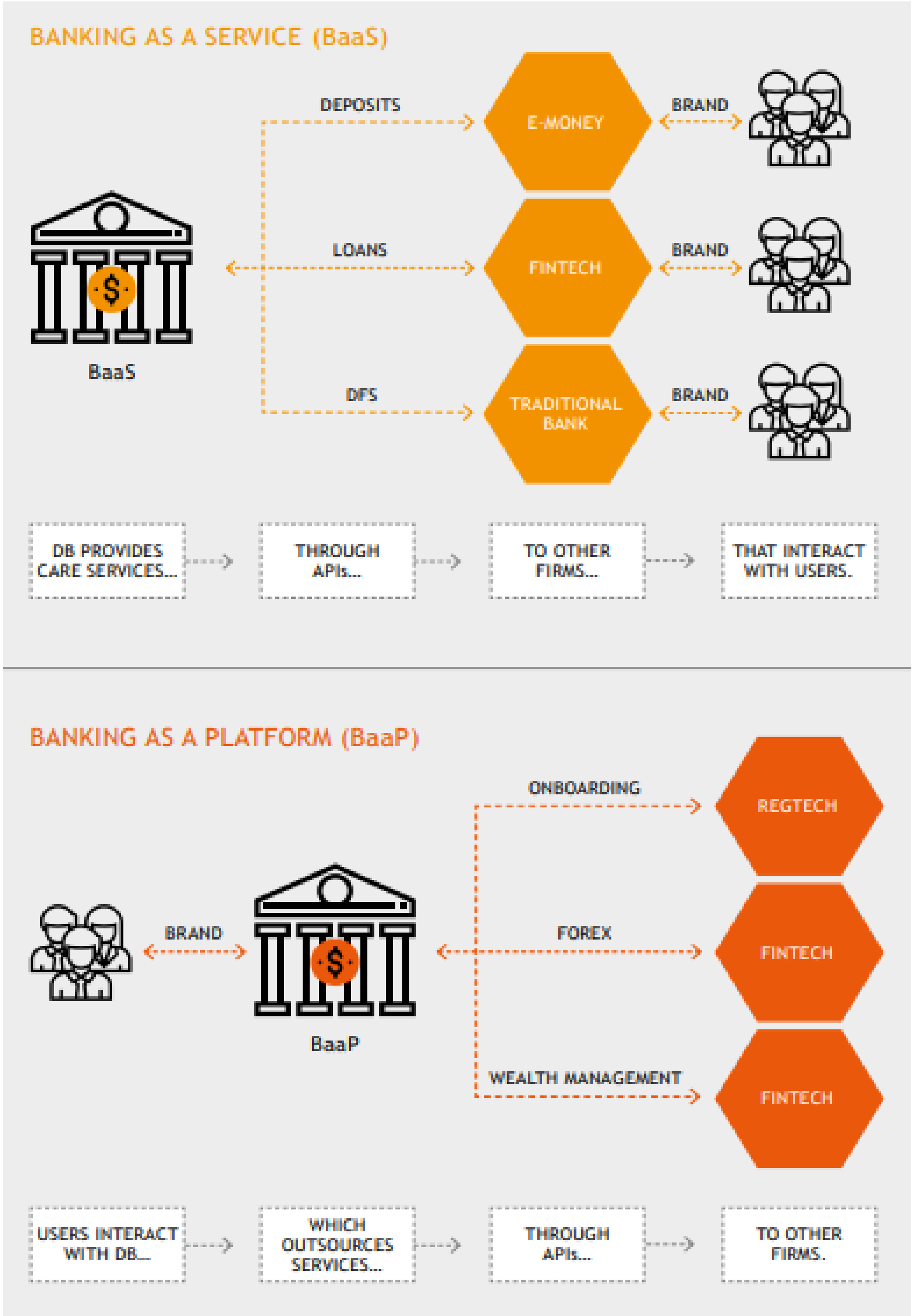
(ii) Digital banks with no links to a traditional bank, such as Kuda Bank in Nigeria or Tymebank in South Africa, which secure a banking licence to deploy and expand their portfolio of digital financial services, including deposits and lending.

(iii) Non-bank mobile network operators, which offer mobile payment systems and other digital financial services. These firms include companies such as M-Pesa in Kenya or MTN's mobile money business in Nigeria and other countries in Africa (Onukwe, 2022).

(iv) Non-bank FinTech companies like Flutterwave, Opay, Interswitch and Paystack.[3] These FinTech firms specialise in offering non-banking digital financial services, such as digital payments for trade and remittances, without initially asking for a banking licence.

[3] Flutterwave is a Nigerian FinTech company that provides a payment infrastructure for global merchants and payment service providers across the region. Since its inception, Flutterwave has processed close to $2 billion in payments and 25 million transactions across over 33 African countries where it currently operates. OPay is a financial services platform that offers mobile payment services in several African countries. The OPay online platform (app) also powers other services such as OMall, an online marketplace, and OTrade, a business-to-business trading firm.

Figure 9. Banking as a service vs. banking as a platform



Source: Alliance for Financial Inclusion, 2021.

Trade-offs between incumbents (banks) and new competitors (non-banks and digital banks) show that these entities are crossing paths: traditional retail banks are setting up their own FinTech companies (Access Bank, GTCO and Stanbic IBTC) in search of new customers and higher profitability. At the same time, non-bank FinTech firms have established business partnerships with banks to take advantage of operational synergies based on revenue-sharing agreements. As illustrated in Figure 9, digital banks can leverage their brands and customer bases in partnership with other firms to offer new innovative services. The use of third parties via application programming interfaces is based on two main types of open banking business models: banking as a service (BaaS) and banking as a platform (BaaP). The banking as a service business model allows banks to use application programming interfaces to distribute core financial services products through third-party or partner-

owned channels. Under this strategy, digital banks do not interact directly with customers. Nonetheless, a licensed digital bank integrates their banking services directly into the products of other non-bank businesses, including other digital financial services providers as well as traditional banks. Banking as a service allows a digital bank to leverage the innovations of smaller FinTechs that lack the operational knowledge, operational assets and regulatory approval to offer these services independently. In a banking as a platform model, digital banks interact directly with customers but opt not to own the operational assets needed to run a bank. This means that they effectively outsource significant, if not all, key operations such as IT, compliance processes and specific financial services such as foreign exchange, insurance or wealth management services. Banking as a platform is a tool for digital banks to diversify customer offerings while at the same time allowing for smaller players to gain access to customers within the banking ecosystem. From the financial inclusion point of view, both business models offer great opportunities to reach underserved customers.

The type of technology adopted also plays a crucial role: to date, the most important enabler of digital financial services has been the widespread adoption of mobile phones with powerful data processing capabilities and access to data networks. Most providers of digital financial services start out as mobile phone apps, with some even lacking a website to make transactions. Recent studies (Jenik and Zetterli, 2020) show that digital banks have a competitive advantage with respect to traditional retail banks when it comes to reducing costs for customers and reaching out to underserved segments, which can make up 50–60% of the customer base, on average.[4]

The comparative advantages of digital banks vs. traditional brick-and-mortar retail banks (Jenik and Zetterli, 2020) can be summarised as follows:

- Customer acquisition costs for digital banks can be around 5–15% of the costs incurred by traditional retail banks.
- Digital banks can operate alternative distribution channels at just 1–5% of the costs traditional retail banks pay to operate a branch.
- Cost-to-income ratios can be more than 20% lower for banks serving customers through digital channels than for banks relying on traditional channels.
- Digital banks can effectively target underserved segments. Such segments make up 50–60% of the studied banks' customer bases, on average.

Conclusion

This chapter presents new evidence on how the rollout of digital financial services continues to transform the traditional banking-dominated financial sector in Africa. We documented the fast growth of new firms offering a wide range of digital financial services on the continent: as of early 2022, more than 1 000 digital financial services companies were active in Africa, up from 450 two years earlier. Of these, 80% are homegrown and 20% come from outside of Africa. While four countries (Nigeria, South Africa, Kenya and Egypt) host 70% of FinTech/digital financial services providers, these countries account for 30% of the African population and have been able to attract most of the funding. The impressive growth in FinTech penetration in these countries can be attributed to a number of factors, including several years of interest from venture capital investors, high growth potential, large potential markets due to young, digital-savvy populations and favourable regulatory environments.

The digital financial services sector has also been diversifying in several business areas, from key services, such as payments, lending and remittances, to new high-growth areas, such as software solutions, investech, insurtech and blockchain services. Pushed by the competition from new digital players, traditional banks have started to accelerate the digitalisation of their own services. Based on our 2022 EIB Banking in Africa Survey,

[4] Tymebank is a digital bank that was founded with financial inclusion as a core business objective. Since it launched in 2018, it has on-boarded over 2 million customers, about 50% of them women. It offers simple products, such as checking accounts, savings accounts and debit cards, to low-income customers at low prices and through a distribution network that combines online and offline customer interaction. It is a compelling example of how challenger banks can leverage digital technology to reach excluded customer segments with more affordable and more useful products. See Jenik and Zetterli (2020).

almost nine out of ten of the banks surveyed across sub-Saharan Africa are investing in the digital upskilling of staff and management via dedicated training programmes. With respect to the 2021 survey, the share of customer transactions via digital channels has increased. In Africa, the share of banks providing digital applications or services ranges from a minimum of 80% in Central Africa to more than 95% in West Africa (mostly driven by Nigeria), with East and Southern Africa falling somewhere in between.

Digital financial services in Africa are offered by different types of entities reflecting different ownership structures, ranges of products and services, digital technologies and open banking business models. New players include: (a) digital banks with no links to traditional banks, which secure a banking licence to deploy and expand their range of services, including deposits and lending; (b) non-bank mobile network operators, which offer mobile payment systems and other digital financial services; and (c) non-bank FinTech companies that specialise in offering non-banking financial services, such as digital payments for trade or remittances. Finally, traditional retail banks are responding by setting up their own FinTech companies in pursuit of new customers and higher profitability.

The continuing high growth in demand for digital financial services pushes traditional banks to increasingly adopt digital technologies and open banking business models that should offer a long-term competitive advantage. Looking ahead, the banks that have a vision for open banking beyond compliance are best placed to compete effectively with non-traditional players, such as big tech and FinTech, and to deliver the seamless experiences their customers expect, especially in Africa, where the median customer is very young and part of the digital generation. To keep pace with digital innovation, the European Investment Bank's proprietary Banking in Africa survey has indicated that leading incumbent banks are seeking to organise their activities towards new business and technology capabilities. They are re-evaluating their operating models and investing in open technology architecture. These African banks are also starting to rethink their internal policies regarding data management and cybersecurity needs and find new ways of competing in a fast-paced financial ecosystem.

References

African Private Equity and Venture Capital Association (2022). "Venture capital in Africa report." April. Available at: https://www.avca-africa.org/media/2967/62644-avca-avca-venture-capital-in-africa-report-v13.pdf.

Alliance for Financial Inclusion (AFI) (2021). "Policy framework on the regulation, licensing and supervision of digital banks." Available at: https://www.afi-global.org/publications/policy-framework-on-the-regulation-licensing-and-supervision-of-digital-banks/.

Ayyagari, M., Demirguc-Kunt, A. and Maksimovic, V. (2014). "Who creates jobs in developing countries?" *Small Business Economics*, 43, pp. 75–99. Available at: https://doi.org/10.1007/s11187-014-9549-5.

Cali, C., Wollny, L., Minsat, A. and Saint Martin, E. (2021). "Digital financial services:" *Finance in Africa: for green, smart and inclusive private sector development*. European Investment Bank, Luxembourg.

Dalberg (2019). "Bridging the credit gap for Micro and Small Enterprises through digitally enabled financing models." Available at: https://www.findevgateway.org/slide-deck/2019/01/bridging-credit-gap-micro-and-small-enterprises-through-digitally-enabled.

Google and IFC, a member of the World Bank Group (2020). "e-Conomy Africa 2020 - Africa's $180 billion internet economy future." Available at: https://www.ifc.org/wps/wcm/connect/e358c23f-afe3-49c5-a509-034257688580/e-Conomy-Africa-2020.pdf?MOD=AJPERES&CVID=nmuGYF2.

GPCA (2022). "2022 global private capital industry data & analysis." Available at: https://www.globalprivatecapital.org/research/2022-global-private-capital-industry-data-analysis/.

GSMA (2021). "State of the industry report on mobile money." Available at: https://www.gsma.com/sotir/.

GSMA (2022). "State of the industry report on mobile." Available at: https://www.gsma.com/sotir/.

IFC (2017). "MSME finance gap report." Available at: https://www.smefinanceforum.org/post/msme-finance-gap-report.

Jenik, I. and Zetterli, P. (2020). "Digital banks: how can they deepen financial inclusion?" Available at: https://www.cgap.org/research/reading-deck/digital-banks-how-can-they-deepen-financial-inclusion.

Onukwe, A. (2022). "Africa's biggest telco thinks its booming fintech and 4G services will woo Gen Z users." Available at: https://qz.com/africa/2137457/mtn-nigeria-thinks-its-fintech-and-4g-expansion-will-woo-gen-zs/.

World Bank (2020). "Promoting digital and innovative SME financing." Available at: https://www.gpfi.org/news/promoting-digital-and-innovative-sme-financing.

5

Climate change in Africa: Risks and responses

This chapter is authored by Colin Bermingham, Matteo Ferrazzi, Fotios Kalantzis and Sanne Zwart, all staff members of the European Investment Bank. The authors gratefully acknowledge the contributions to the chapter from Arthur Minsat and Elisa Saint Martin of the OECD on the issue of environmental air pollution and environmental taxes. The authors would like to thank Claudio Cali, Mihaljek Dubravko, Barbara Marchitto, Debora Revoltella and Ricardo Santos for comments on an earlier draft and Francesca Mameri for research assistance.

Key messages

The EIB climate country risk scores show that sub-Saharan Africa is the region most exposed to physical risk in the world. The key risks from climate events are loss of agricultural output, damage to infrastructure and growing water scarcity. Many of the countries most exposed to the direct physical impacts of climate change are also among those least able to adapt. While transition risk is low compared to other regions, some countries in sub-Saharan Africa do face high transition risks. Economies such as Algeria, Egypt, Ghana, Côte d'Ivoire, Niger, Nigeria, Senegal, Republic of the Congo, Cameroon, Angola and Mozambique are more at risk due to their dependence on fossil fuel extraction. Environmental degradation also imposes a huge cost on African countries. According to new estimates of the cost of air pollution in Africa, ambient particulate matter pollution (APMP) caused at least 383 000 premature deaths in Africa in 2019. This represented about 7.4% of total premature deaths in the region, up from only 3.6% in 1990.

Sub-Saharan African banks are reacting to the multifaceted challenges posed by climate change. This is clearly illustrated by our survey: 53% of banks already have a formal climate change strategy and a further 26% plan to introduce one, meaning that almost four out of five banks could soon have formal strategies. Reducing the financial risk stemming from climate change, cited by more than 80% of the banks in our survey, is one of the main reasons for banks to define a climate strategy. Climate change may also create opportunities, however, with more than 80% of banks also citing this as a reason to have a climate strategy. Nearly 70% of banks see climate lending as an opportunity, making it the main way that banks hope to benefit from fighting climate change. To date, only a fifth of banks have introduced green lending products so the large gap between the share of banks that see climate lending as an opportunity versus those that have already launched products means there is significant scope to expand green lending. However, banks will need support. About 60% cite a lack of expertise, data and tools for assessing climate risk as a barrier to doing more to identify climate risks and opportunities.

EIB climate risk country scores

No country in the world is immune to the impacts of climate change, the risks of which are now at a "code red" level for all of humanity (Intergovernmental Panel on Climate Change (IPCC), 2022). African countries are even more vulnerable to the impacts of climate change for two reasons: they are often more exposed because of their geographical position (being located in hotter areas or exposed to droughts and storms, for instance); and they have fewer possibilities to put in place adaptation measures (like barriers, prevention measures, emergency preparedness plans, etc.) to moderate any potential damage.

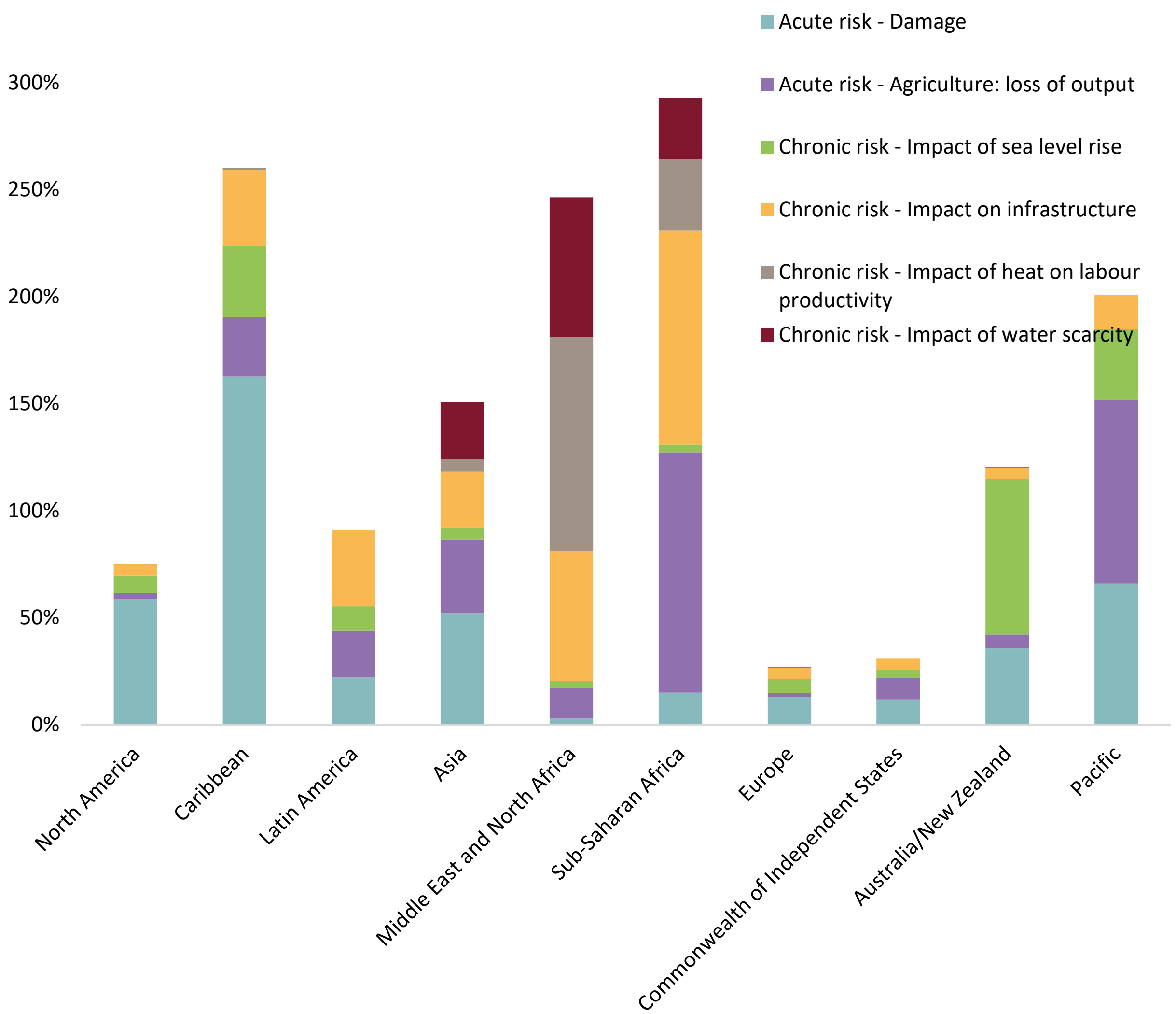
The African continent only contributes 3% of annual global CO_2 emissions, despite being home to 17% of the world's population. According to the World Inequality Report 2022, average emissions in Africa reached 1.1 metric tonnes of CO_2 per capita compared to as much as 14.2 in the United States, 7.4 in China and 1.7 in India (Chancel et al., 2022). However, it stands out disproportionately as the continent most vulnerable to climate change (UNEP, 2021), and the increased frequency of violent weather events is heightening physical risks.[1] In 2021 and the first part of 2022, tropical cyclones hit Madagascar, Zimbabwe and other Southern African countries. Storms disrupted some parts of Nigeria, Sudan, South Africa and Zimbabwe. Drought affected people in Ethiopia, Niger, Cabo Verde, Somalia, Zambia and Zimbabwe. More than 20 African countries were hit by floods, and many other climate events occurred across the continent. In total, more than 44 million African people were directly affected by such extreme weather events during this period alone, according to the Emergency Events Database maintained by the Centre for Research on the Epidemiology of Disasters of the Université Catholique de Louvain. Transition risk — associated with the transition to a low-carbon economy — is also increasing. Some sectors of the economy, such as those exposed to fossil fuels and those with higher emission intensities, may face big shifts in asset values or higher costs of doing business. For example, several countries are fossil fuel exporters, and for some such as Algeria, Angola, Nigeria and Congo, fossil fuel exports represent more than 80% of their total exports.

African countries face particularly high physical risks related to climate change that are often combined with low adaptation capacity. To better monitor climate risk at country level, the European Investment Bank developed a climate risk methodology to map climate-related risks — both physical and transition risks — at country level. These risks are reflected in the European Investment Bank's climate risk country scores (Ferrazzi, Kalantzis and Zwart, 2021), the methodology of which is explained in more detail in Appendix 1 of this chapter. To build the physical risk component, the impact of climate events has been estimated in gross domestic product (GDP) terms (in other words, in the percentage of the size of each economy). The total physical risk is given by the sum of the damage deriving from natural disasters ("acute" events such as storms, floods, droughts, etc.), production losses in agriculture, the impact of sea level rise (for countries and cities exposed to the sea), the impact on infrastructure, the impact of heat on labour productivity (labour productivity is seriously affected when temperatures are high) and the effects of water scarcity (water is a relevant component for agricultural production and for industry). For around two-thirds of African countries, losses deriving from climate change are estimated to be higher than 1% of GDP per year. Hence, the cumulated effects over many years can be very relevant. The chart below gives an overview at the global level, comparing Africa to other areas of the world.

Sub-Saharan Africa is the region most exposed to physical risk in the world. Sub-Saharan African nations are particularly vulnerable to the long-term impacts on agriculture relative to other regions globally, as this is a key sector of their economies. Of the 40 most agriculture-centric countries in the world (based on the weight of agriculture in GDP), 30 are African countries, many of them in West Africa (Food and Agriculture Organization of the United Nations, 2017). Another major challenge for African countries is posed by the chronic risks threatening infrastructure (World Bank, 2016). Gradual changes in climate can place infrastructure under higher strain, making upgrades necessary and increasing maintenance costs. Reduced reliability of infrastructure will also impact the profitability of new projects.

[1] WMO (2021) shows that the number of weather disasters in continental Africa has increased significantly in the last two decades (2000–2009 and 2010–2019) compared to the decades from 1970 to 1999.

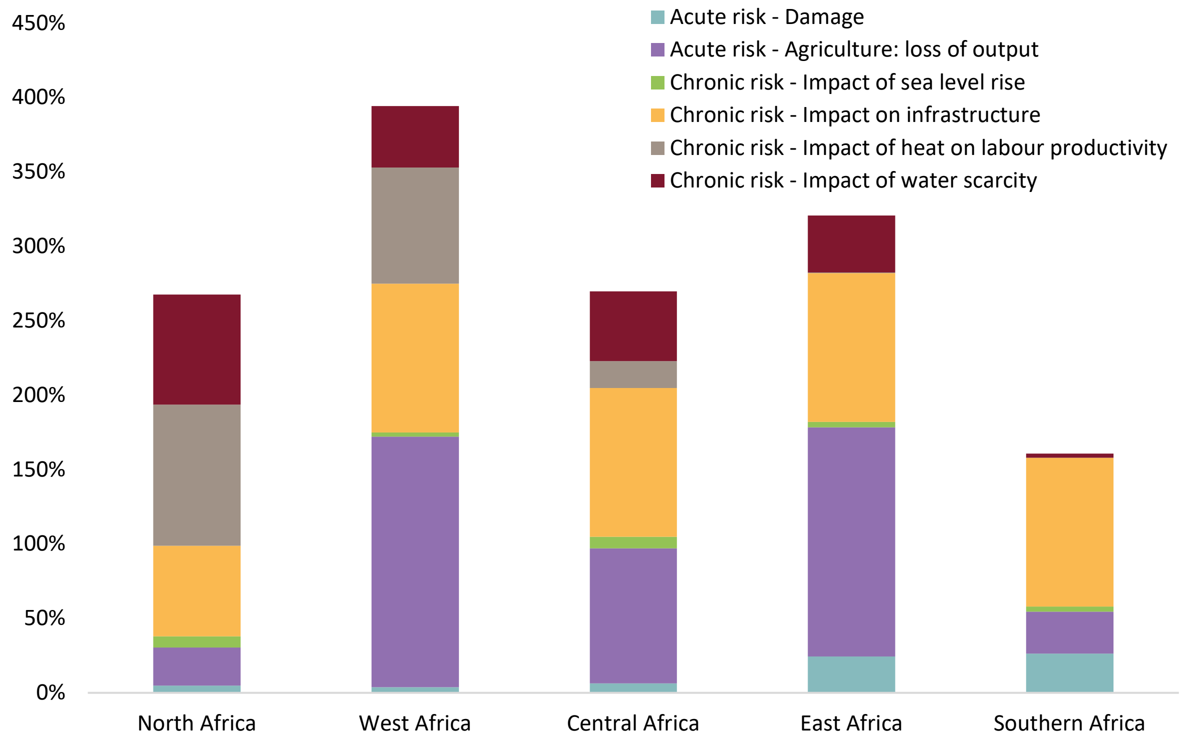
Figure 1. Impact of the different components of physical risk (GDP impact, world average = 100%)



Source: EIB climate risk country scores.
Note: Results for North Africa only are shown in the next chart.

Acute risk and damage from natural disasters are somewhat less relevant in continental Africa (as a share of total physical risk) than in other areas, but these risks are likely to grow in the future given the growth witnessed since 1970 in the number of climate disasters. The latest IPCC report (2022) finds most regions in Africa will be exposed to a greater range of climate impacts over time. The rise in sea level is a major risk for the Seychelles, Cabo Verde and Mozambique (Diaz, 2016), where a significant part of the population lives in coastal areas. In terms of the impact of heat on labour productivity, North and West Africa display greater risks, with temperatures often exceeding 29 or 30 degrees Celsius; a threshold above which labour productivity is negatively affected (Woetzel et al., 2020), particularly for outdoor activities such as agriculture. Water scarcity is particularly acute in North Africa and in the Sahel area, whereas several countries in Central and Southern Africa are rich in water resources.

Figure 2. Impact of the different components of physical risk in Africa[2] (GPD impact, world average = 100%)



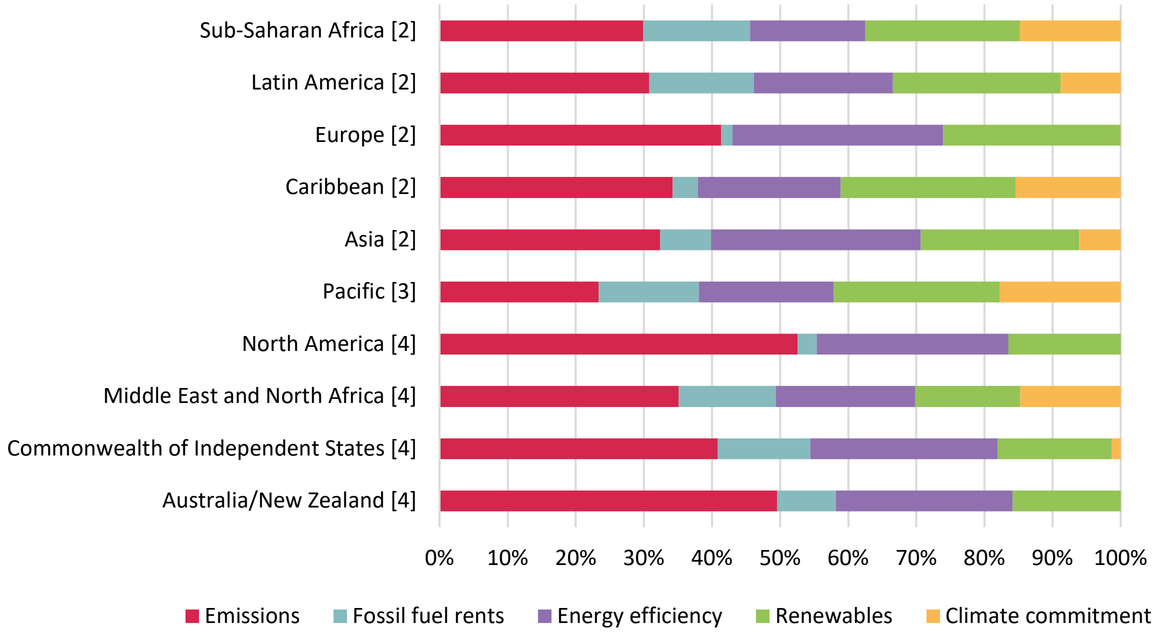
Source: EIB climate risk country scores.

Many of the countries most exposed to the direct physical impacts of climate change are also among those least able to adapt. Sub-Saharan African countries stand out in this regard. Poor-quality infrastructure and housing amplify the human and economic impact of natural disasters. High levels of public debt and weak domestic revenue sources hinder timely investment in adaptation. People on lower incomes with few savings and little capacity to borrow are very vulnerable to any kind of crisis. Hence, African countries very often face the double jeopardy of high exposure to physical risk and lower adaptation capacity (Feyen et al., 2019).

Sub-Saharan Africa faces low transition risks, but mitigation is challenging. Turning to transition risk — which encompasses the risks and costs associated with a green transition — the European Investment Bank's climate risk country scores for transition risk (the methodology of which is described in more detail in Appendix 1) present a different picture when compared to physical risk scores. It is higher-income countries — which consume a large share of the world's resources, generate significant emissions and are the main culprits behind global warming — that generally face higher risks from the transition to a low-carbon world economy.

[2] In the chart, the following country aggregation has been used. North Africa: Algeria, Morocco, Tunisia and Egypt. West Africa: Benin, Burkina Faso, Cabo Verde, The Gambia, Ghana, Guinea, Guinea-Bissau, Côte d'Ivoire, Liberia, Mali, Mauritania, Niger, Nigeria, Senegal, Sierra Leone and Togo. Central Africa: Congo, Democratic Republic of the Congo, Republic of Cameroon, Central African Republic, Chad, Equatorial Guinea, Gabon, São Tomé and Príncipe, Burundi and Sudan. East Africa: Rwanda, Tanzania, Uganda, Djibouti, Ethiopia and Kenya. Southern Africa: Comoros, Angola, Botswana, Lesotho, Madagascar, Malawi, Mauritius, Mozambique, Namibia, Seychelles, South Africa, Eswatini, Zambia and Zimbabwe.

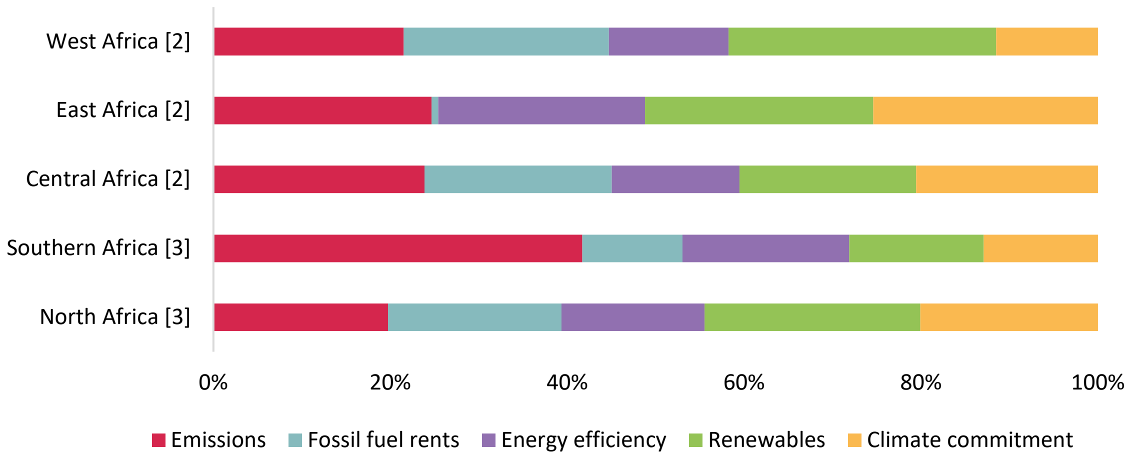
Figure 3. Contribution of the main components to the overall transition risk score



Source: EIB climate risk country scores.
Note: The numbers in square brackets present the average transition risk scores from 1 (very low risk) to 5 (very high risk). Results for North Africa only are shown in the next chart. The scores are weighted by the countries' GDPs.

While transition risk is low compared to other regions, some sub-Saharan African countries do face high transition risks. Economies such as Algeria, Egypt, Ghana, Côte d'Ivoire, Niger, Nigeria, Senegal, Republic of the Congo, Cameroon, Angola and Mozambique are more at risk due to their dependence on fossil fuel extraction. Such risks may be mitigated with targeted investments that support renewable energy deployment and the adoption of energy saving measures. Alternatively, a slower transition to renewable energy and energy saving measures is likely to increase the risk profiles of these countries.

Figure 4. Breakdown of the overall transition risk score by African region



Source: EIB climate risk country scores.
Note: The numbers in square brackets present the average transition risk scores from 1 (very low risk) to 5 (very high risk). The scores are weighted by the countries' GDPs.

Local environmental challenges also pose an increasing and new threat to development. The European Investment Bank climate risk country scores obviously do not capture all of the environmental costs and dangers faced by developing countries. The growing cost of air pollution illustrates additional challenges. According to new estimates of the cost of ambient particulate matter pollution (APMP) in Africa, published in the OECD's report Africa's Development Dynamics 2022:

- In 2019, APMP caused at least 383 000 premature deaths in Africa. This represented about 7.4% of total premature deaths in the region, up from only 3.6% in 1990.
- Although fewer Africans are dying of air pollution than in other regions, the growth of APMP-related deaths is among the highest globally in Africa. Over the 2010–2019 period, the growth in the death toll from APMP in Africa grew by 30%, ahead of world growth (23%) and that of China (20%) (see Table 1).
- The welfare cost of APMP was estimated to cost African countries an average of 5.2% of their GDP in 2019, compared with 4.1% in 2000. Using the value of a statistical life method, the global cost of pollution represents 5.8% of the world's GDP (Roy, forthcoming 2022).

Table 1. Premature deaths from ambient particulate matter pollution, 1990–2019

	1990	2000	2010	2019	Δ from 2010 to 2019
Africa	164 841	222 847	295 051	383 420	*plus* 30%
China	520 214	812 474	1 185 691	1 423 633	*plus* 20%
India	279 461	384 246	607 160	979 682	*plus* 61%
World	2 047 171	2 607 107	3 359 355	4 140 971	*plus* 23%

Source: Roy, R. (forthcoming, 2022), Addressing the toll of air pollution in Africa.

As governments face significant pressure to increase their domestic revenue base following the increase in government debt during the coronavirus pandemic, raising climate-related taxes offers the possibility of influencing desired climate outcomes, reducing hazards such as air pollution and improving public debt sustainability. Fossil fuel subsidies provide one example of where this might work. According to the International Monetary Fund (IMF), the costs incurred by fossil fuel subsidies, along with environmental externalities and foregone consumption taxes, amounted to 11.7% of GDP in Africa compared to 10.6% in Asia-Pacific and 4.7% in Latin America and the Caribbean in 2019. Reducing the costs of fossil fuel subsidies is high on the agenda for many African countries as their costs have risen in line with higher fuel prices.

Environmental taxation can incentivise cleaner activities to drive Africa's green transition. Policymakers can introduce or reform environmentally related taxes[3] and other price-based policy instruments to mobilise additional resources for climate adaptation and discourage polluting behaviours. Many African countries already collect implicit forms of environmental taxation through energy taxes, including excise taxes on fuels and electricity consumption. Most only apply narrowly to certain fuels, such as gasoline used for road transport, which does not provide a consistent carbon price across the economy. In recent years, some countries have started introducing explicit environmental taxation. South Africa, for example, established a carbon tax in 2018 with a nominal tax rate of ZAR 134 (€7.5) per tonne of carbon dioxide equivalent, covering about 41% of CO_2 emissions from energy use (OECD, 2021a).

The second appendix in this chapter provides more detail on the use of environmental taxation in Africa and the cost of fossil fuel subsidies, drawing on the OECD's flagship report Africa's Development Dynamics 2022: Regional Value Chains for a Sustainable Recovery.[4]

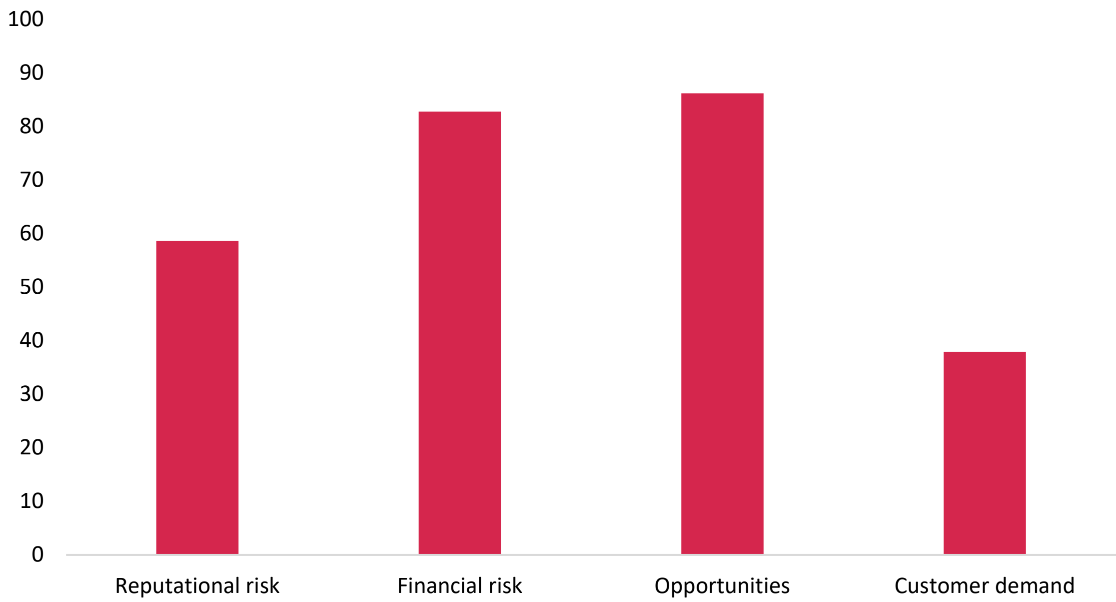
[3] Environmentally related taxes increase the cost of polluting products or activities, which might discourage their consumption and production, regardless of the intended purpose of the tax (OECD, 2019a).
[4] https://www.oecd-ilibrary.org/development/africa-s-development-dynamics_3290877b-en.

The banking sector's approach to climate risk

Sub-Saharan African banks are reacting to the multifaceted challenges posed by climate change. With countries in the region facing significant climate risk, the implications for firms and financial intermediaries are salient. This is clearly illustrated by our survey: 53% of banks already have a formal climate change strategy and a further 26% plan to introduce one, meaning that almost four out of five banks could soon have formal strategies in place. While risk avoidance is a key motivation for banks' climate change strategies, they are also looking for opportunities to benefit from green investments and finance.

Reducing the financial risk stemming from climate change was cited by more than 80% of the banks in the European Investment Bank's Banking in Africa survey (Figure 5) and is one of the main reasons for banks to define a climate strategy. Reputational risk is also a concern, as banks that are perceived to be doing less on climate may suffer commercial consequences, but this risk is perceived as less prominent than financial risk. Climate change may also create opportunities; however, with more than 80% of banks also citing this as a reason to have a climate strategy, it is a driver of comparable importance to financial risk. Consumer demand is not a major driver of banks' climate strategies but could be expected to increase as time goes on and as the impacts of climate change become more manifest.

Figure 5. Reasons for having a climate change strategy (%)



Source: EIB Banking in Africa survey.

The banks that have a climate strategy take it seriously, with 70% engaged in regular monitoring of performance against this strategy, while the other 30% plan to introduce monitoring. The majority of banks surveyed have a person or a team responsible for the assessment of climate risks — over 50% have dedicated staff and another 18% plan to deploy staff for this purpose. There is still some catching up to be done in terms of formal skills training for these roles, however. Only one-third of banks have staff that already have formally recognised climate risk qualifications (such as the United Nations Environment Programme Finance Initiative — Environmental, Social and Governance Risk Assessment Certification), but a similar share plan to add or train staff with these qualifications.

The financial risk motivation for having a climate change strategy is clear. **The EIB climate risk country scores show that climate risk is high for sub-Saharan Africa, and this could manifest in several ways for banks**. Drought could result in farmers being unable to repay loans due to lower crop yields. Rising sea levels and associated

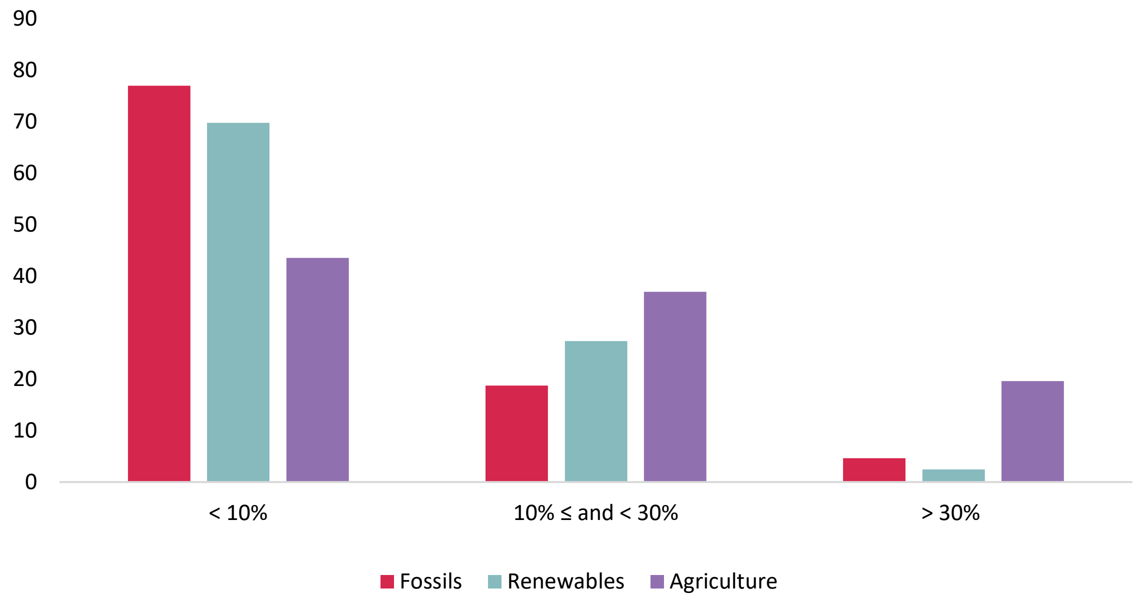
compound risks such as coastal erosion, recurrent coastal flooding and storm surges could threaten properties, diminish their value and increase risk in mortgage portfolios for banks. Banks also face relevant transition risks from loans extended to companies engaged in high-emission activities, such as extractive industries. For example, 90% of Africa's coal reserves could become stranded resources (Bos and Gupta, 2019), potentially causing material losses for companies and affecting vulnerable workers and communities that depend directly on these activities.

Accordingly, banks need to have a thorough understanding of the risks associated with both their current loan portfolio and prospective loans. The European Investment Bank's Banking in Africa survey asks banks about their sectoral asset allocation across three broad groups:

- Activities directly related to the exploitation or use of fossil fuels (oil, gas, coal, production or distribution, including upstream and midstream services);
- Renewable energy (including hydropower, solar power, photovoltaic power, wind power, etc.);
- Agriculture (including livestock).

About 23% of banks allocate more than 10% of their loans to the fossil fuel industry but this increases to 30% for renewables, showing that there is a shift among banks towards more renewable lending. Agriculture is even more important, however, with more than half of banks allocating more than 10% of their loans to the sector. This shows that banks have greater exposure to physical risk than transition risk in their existing loan portfolios, which reinforces the message from the European Investment Bank's climate model. Nonetheless, it is encouraging that climate lending is a key part of the loan book.

Figure 6. Sectoral asset allocation (%)



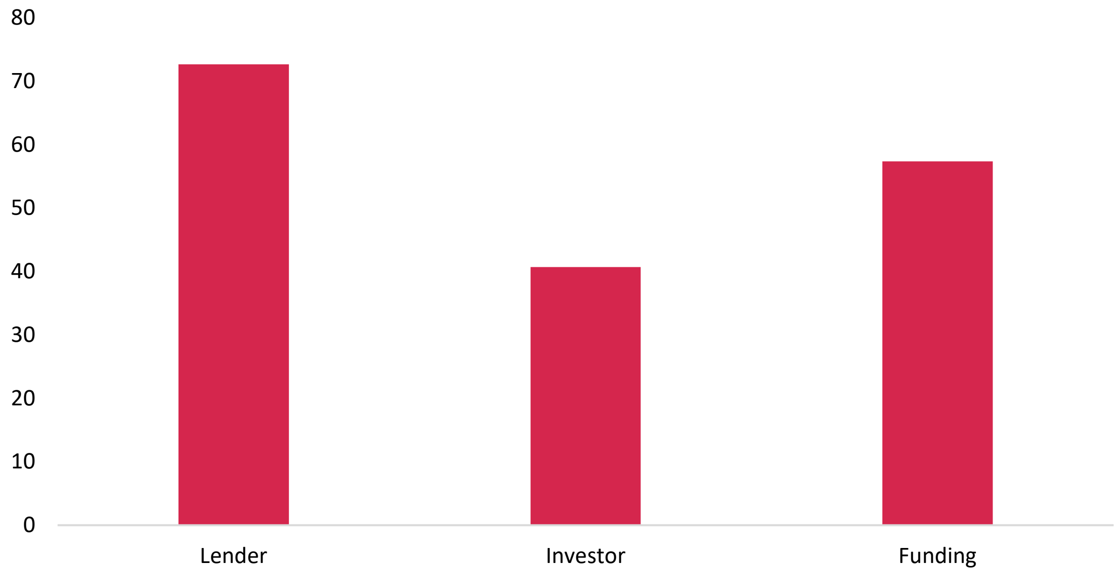
Source: EIB Banking in Africa survey.

Given that banks' portfolios already have significant exposure to climate risk, it is reassuring that these risks are an important consideration when it comes to the origination process. **The survey finds that 70% of banks take account of climate risk when assessing a client or project** and another 20% plan to introduce this in the underwriting process. Pricing is one way of accounting for climate risk, with 24% of banks adjusting loan costs based on climate risk and another 20% set to follow suit. However, this means that for many banks, climate risk does not affect loan pricing or is reflected through non-price factors, such as the other terms of the loan or the decision to underwrite in the first place.

Assessing the climate impact of a proposed lending project is an important part of identifying climate opportunities. **Nearly 70% of banks see climate lending as an opportunity**, making it the main way that banks

hope to benefit from fighting climate change. To date, only one-fifth of banks have introduced green lending products, so the large gap between the share of banks that see climate lending as an opportunity versus those that have already launched products means there is significant scope to expand green lending. However, banks will need support. About 60% cite a lack of expertise, data and tools for assessing climate risk as a barrier to doing more to identify climate risks and opportunities. Moreover, nearly 67% of banks think the most meaningful way in which international financial institutions can support them in expanding green lending is by providing them with training and technical assistance. This points to a clear policy priority in terms of supporting more green lending.

Figure 7. Perceived opportunities in green finance (%)



Source: EIB Banking in Africa survey.

After lending, funding is the next biggest opportunity, with more than half of banks seeing it as a way to adapt to climate change, compared to just 40% of banks that see opportunities in green investing. In terms of funding, banks would hope to benefit from longer maturities and lower rates when raising funds using green bonds, but only 6% of banks in the survey had already issued green bonds, albeit with another 16% planning to do so. As in the case of green lending, a lack of technical capacity, in terms of either how to issue green bonds or how to carry out the associated monitoring and assessment, is also a barrier to increasing green funding. This means there is again scope to improve green issuance in the banking sector by providing the appropriate technical assistance.

References

AUC/OECD (2022). *Africa's Development Dynamics 2022: Regional Value Chains for a Sustainable Recovery.* African Union Commission, Addis Ababa/OECD Publishing, Paris. Available at: https://doi.org/10.1787/2e3b97fd-en.

Bamber, J. L., Oppenheimer, M., Kopp, R. E., Aspinall, W. P. and Cooke, R. M. (2019). "Ice sheet contributions to future sea-level rise from structured expert judgment." *PNAS*, Vol. 116 (23), pp. 11195–11200. Available at: https://doi.org/10.1073/pnas.1817205116.

Bos, K. and Gupta, J. (2019). "Stranded assets and stranded resources: Implications for climate change and global sustainable development." *Energy Research and Social Science*, Vol. 56, 101215. Available at: https://www.sciencedirect.com/science/article/pii/S2214629618305383.

Chancel, L., Piketty, T., Saez, E. and Zucman, G. (2022). *World Inequality Report 2022*. World Inequality Lab. Available at: https://wir2022.wid.world/.

Chen, C., Noble, I., Hellmann, J., Coffee, J., Murillo, M. and Chawla, N. (2015). *University of Notre Dame Global Adaptation Index: Country Index Technical Report*. Available at: https://gain.nd.edu/our-work/country-index/.

Diaz, D. B. (2016). "Estimating global damages from sea level rise with the Coastal Impact and Adaptation Model (CIAM)." *Climatic Change*, Vol. 137, pp. 143-156. Available at: https://doi.org/10.1007/s10584-016-1675-4.

European Commission (2022). "EU-Africa: Global Gateway Investment Package." European Commission, Brussels. Available at: https://ec.europa.eu/info/strategy/priorities-2019-2024/stronger-europe-world/global-gateway/eu-africa-global-gateway-investment-package_en.

European Investment Bank (2020). *EIB Group Climate Bank Roadmap 2021–2025.* European Investment Bank, Luxembourg. Available at: https://www.eib.org/en/publications/the-eib-group-climate-bank-roadmap.

Ferrazzi, M., Kalantzis, F. and Zwart, S. (2021). "Assessing climate change risks at the country level." European Investment Bank Working Paper 2021/03.

Feyen, E., Utz, R., Zuccardi Huertas, I., Bogdan, O., and Moon, J. (2019). "Macro-Financial Aspects of Climate Change." Policy Research Working Paper No. 9109. World Bank, Washington DC. Available at: https://openknowledge.worldbank.org/handle/10986/33193.

Food and Agriculture Organization of the United Nations (FAO) (2017). *The impact of disasters and crises on agriculture and food security*. Food and Agriculture Organization, Rome.

Hochrainer-Stigler, S. (2006). *Macroeconomic Risk Management against Natural Disasters.* Deutscher Universitaets-Verlag, Wiesbaden.

IEA (2022), *Africa Energy Outlook 2022*, International Energy Agency, Paris, Available at: https://www.iea.org/reports/africa-energy-outlook-2022

IMF (2022). "Fossil fuel subsidies database." Available at: https://www.imf.org/en/Topics/climate-change/energy-subsidies.

IPCC (2019). *IPCC Special Report on the Ocean and Cryosphere in a Changing Climate* [Pörtner, H.-O., Roberts, D.C., Masson-Delmotte, V., Zhai P., Tignor, M., Poloczanska, E., Mintenbeck, K., Alegría, A., Nicolai, M., Okem, A., Petzold, J., Rama, B., Weyer, N.M. (eds.)]. Cambridge University Press, Cambridge, United Kingdom. Available at: https://doi.org/10.1017/9781009157964.

IPCC (2022). *Climate Change 2022: Mitigation of Climate Change, Working Group III contribution to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change.* Available at: https://www.ipcc.ch/report/ar6/wg3/.

McMichael, C., Dasgupta, S., Ayeb-Karlsson, S. and Kelman, I. (2020). "A review of estimating population exposure to sea-level rise and the relevance for migration." *Environmental Research Letters*, Vol. 15(12), 123005.

Moody's Investors Service (2019, January). "General principles for assessing environmental, social and governance risks."

NGFS (Network for Greening the Financial System) (2020, June). *NGFS climate scenarios for central banks and supervisors*. Available at: https://www.ngfs.net/en/ngfs-climate-scenarios-central-banks-and-supervisors.

OECD (2019a). "Green growth challenge: Shifting the tax burden in favour of environmentally related taxation." Available at: https://www.oecd.org/env/tools-evaluation/environmentaltaxation.htm.

OECD (2019b). *Taxing Energy Use 2019: Using Taxes for Climate Action*. OECD Publishing, Paris. Available at: https://doi.org/10.1787/058ca239-en.

OECD (2021a). *Carbon Pricing in Times of COVID-19: Key Findings for South Africa.* Available at: www.oecd.org/tax/tax-policy/carbon-pricing-south-africa.pdf.

OECD (2021b). *Taxing Energy Use for Sustainable Development: Opportunities for energy tax and subsidy reform in selected developing and emerging economies.* Available at: www.oecd.org/tax/tax-policy/taxing-energy-use-for-sustainable-development.pdf.

OECD/AUC/ATAF (2021). *Revenue Statistics in Africa 2021*. OECD Publishing, Paris. Available at: https://doi.org/10.1787/c511aa1e-en-fr.

Roson, R. and Sartori, M. (2016). "Estimation of Climate Change Damage Functions for 140 Regions in the GTAP9 Database." Policy Research Working Paper No. 7728. World Bank, Washington DC. Available at: https://openknowledge.worldbank.org/handle/10986/24643.

Roy, R. (forthcoming, 2022). *Addressing the toll of air pollution in Africa* (working title).

UNECA/ACPC (2020). "Climate change and development in Africa post COVID-19: some critical reflections: discussion paper." UNECA, Addis Ababa. Available at: https://repository.uneca.org/handle/10855/43764.

UNEP (2021). "Responding to climate change." Available at: https://www.unep.org/regions/africa/regional-initiatives/responding-climate-change.

UN/European Commission/IMF/OECD/World Bank (2005). *Handbook of National Accounting: Integrated Environmental and Economic Accounting 2003*. United Nations, New York. Available at: https://unstats.un.org/unsd/environment/seea2003.pdf.

Woetzel, J., Pinner, D., Samandari, H., Engel, H., Krishnan, M., Boland, B. and Powis, C. (2020). *Climate risk and response: Physical hazards and socioeconomic impacts.* McKinsey Global Institute. Available at: https://www.mckinsey.com/business-functions/sustainability/our-insights/climate-risk-and-response-physical-hazards-and-socioeconomic-impacts.

World Bank (2016). *Private Sector Investment in Climate Adaptation in Developing Countries: Landscape, Lessons Learned and Future Opportunities.* World Bank, Washington DC.

World Meteorological Organization (WMO) (2021). *WMO Atlas of Mortality and Economic Losses from Weather, Climate and Water Extremes.* Available at: https://library.wmo.int/index.php?lvl=notice_display&id=21930#.YvUluEZByM8.

Appendix 1: The European Investment Bank climate risk country scores

To better understand and monitor climate risk at the country level, the European Investment Bank, as part of various activities related to the EIB Group Climate Bank Roadmap (European Investment Bank, 2020) and the European Green Deal, developed a climate risk methodology to map climate-related risks — both physical and transition risks — at the country level. These risks are reflected in the European Investment Bank climate risk country scores (Ferrazzi, Kalantzis and Zwart, 2021). The scores are a tool to help understand the relative climate risks faced by countries, as well as the environmental and policy conditions faced by firms in each country. They can also help to identify mitigation and adaptation[5] priorities and related financing needs. A better understanding of the risks and the consequent adaptation and mitigation needs will help to ensure that opportunities to enhance climate resilience are not missed.

For each country, two main types of risks are taken into account: (1) physical risk covers the impacts of the changing climate, including the risk of natural disasters (acute risk), as well as more gradual changes (chronic risk); and (2) transition risks are policy and regulatory risks driven by the introduction of stringent climate policies to help countries achieve carbon neutrality in line with the Paris Agreement goals.

The physical risk scores are based on an estimate of the total annual burden each country faces in terms of damage, costs and losses (in percentage of GDP) related to climate change. The scores are composed of the following building blocks:

- Acute risks of extreme weather events related to hydrological risks (floods and landslides), meteorological risks (extreme temperatures, fog, storms) and climatological risks (droughts, wildfires, glacial lake outbursts).
- Losses deriving from the impact of disasters on agriculture, which is very relevant for African countries. On top of the damage to physical infrastructure (agricultural machinery, irrigation systems, livestock shelters, etc.), farmers are incurring losses related to lower crop yields (Chen et al., 2015; FAO, 2017; Feyen et al., 2019; Moody's Investors Service, 2019).
- Chronic risks arising from long-term and gradual shifts in climate patterns (Feyen et al., 2019; NGFS, 2020; Roson and Sartori, 2016), namely:
    - The impact of sea level rise, which is itself the result of melting glaciers and ice sheets (Bamber et al., 2019; IPCC, 2019; McMichael et al., 2020);
    - The impact on the quality of infrastructure (World Bank, 2016). Just as natural disasters damage infrastructure, gradual changes in climate can place infrastructure under higher strain as well, making upgrades necessary and increasing maintenance costs;
    - The impact of higher temperatures on productivity: the increase in temperatures beyond certain levels (especially since several African countries are already hot climates) is expected to reduce the productivity of workers (Woetzel et al. 2020);
    - The impact of water scarcity (World Bank, 2016), since water has an economic impact as it is needed in agriculture (70% of water is used for the irrigation of land), industry and cities.

In addition, the physical risk score incorporates an assessment of each country's capacity to adapt to climate change. Fiscal revenues and sovereign risk ratings are used as a proxy of each country's financial capacity to adapt to climate change, while governance indicators and the level of human development are used as indicators of institutional capacity. For these reasons, developed countries are better able to cope with the impacts of natural hazards, while developing countries are faced with severe consequences (Hochrainer-Stigler, 2006).

[5] Mitigation capacity refers to actions to reduce greenhouse gas emissions (produce energy in a greener way, etc.). Adaptation capacity is the ability of a system to moderate any potential damage deriving from climate change or to cope with the consequences. Adaptation capacity varies significantly across countries. Some countries are better equipped, politically and economically, to put in place the necessary measures to offset, at least partially, their exposure to physical risk (such as the Netherlands, with respect to its protection against rising sea levels, for instance). In summary, mitigation attends to the causes of climate change, while adaptation addresses its impacts.

In a similar way, the transition risk scores are based on an assessment of a country's exposure to the economic changes caused by the global climate transition and on its capacity to reduce the negative impacts of that exposure (mitigation capacity). Countries can mitigate transition risks by taking action to limit or reduce greenhouse gas emissions. The long-term economic impacts of the climate transition will be lower for countries that can swiftly shift to a lower-carbon development model.

The transition risk scores are based on:

- Revenues stemming from the fossil fuel business. These are expected to decline in the future due to stricter climate policies and changing consumer preferences. Therefore, it is considered an indication of stranded assets.
- Greenhouse gas emissions performance. Higher emissions imply higher costs in the future as a result of more stringent climate policies.
- Mitigation capacity is based on three dimensions:
    - Performance in deploying renewable sources of energy;
    - Performance in implementing energy efficiency improvements;
    - The level of commitment to tackling climate change, based on the nationally determined contributions each country has set under the Paris Agreement.

Based on the economic literature and an econometric analysis, these different components are given appropriate weights to create a composite indicator that reflects the transition risk country score. In addition, when assessing the performance of emissions, energy efficiency improvements and renewables deployment, the scores take into account (1) what the countries have achieved in the recent past, (2) where they stand currently and (3) how far they are from the global optimal standard.

Appendix 2: Environmentally related taxes can help mitigate the growing cost of air pollution in Africa

Arthur Minsat and Elisa Saint Martin, OECD Development Centre

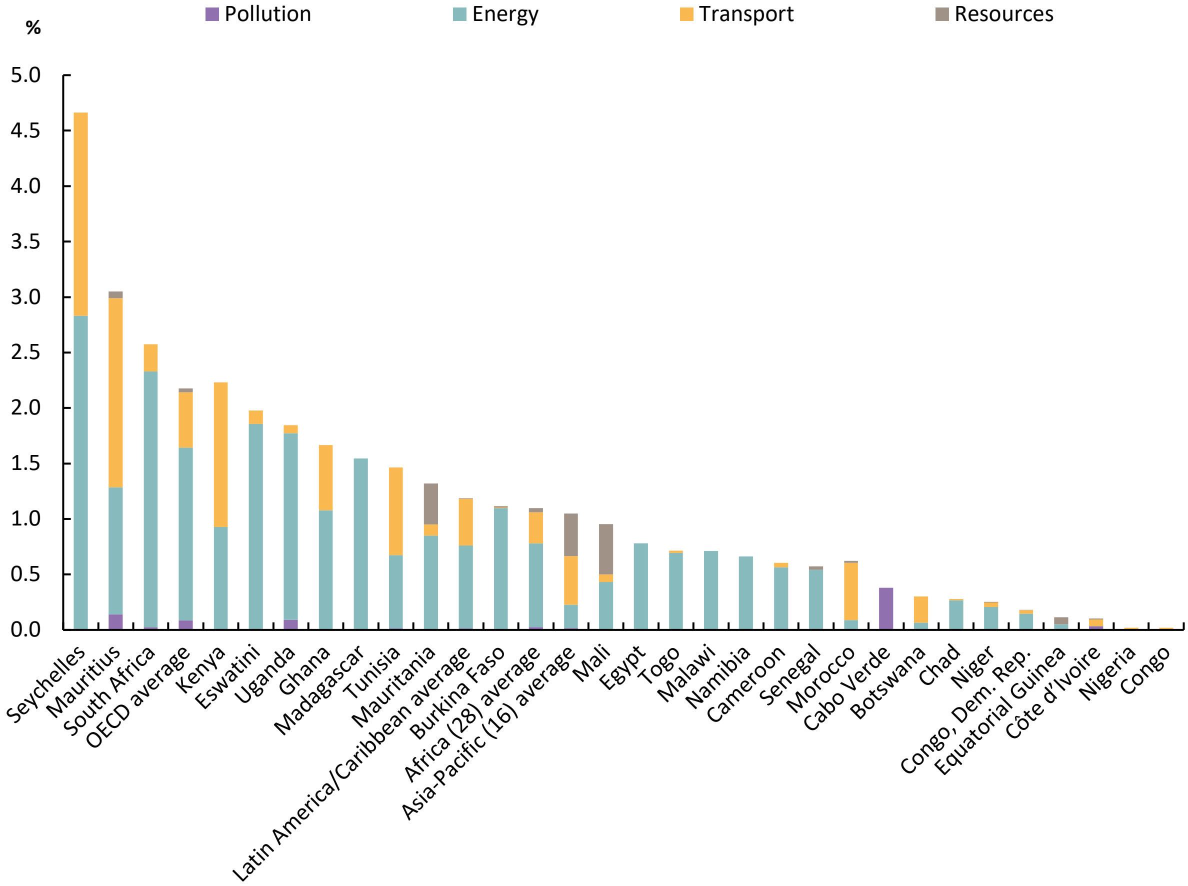
This contribution draws on findings included in the African Union Commission (AUC)/OECD flagship report, Africa's Development Dynamics 2022: Regional Value Chains for a Sustainable Recovery,[6] *and the annual OECD/AUC/African Tax Administration Forum (ATAF) report, Revenue Statistics in Africa 2021.*[7]

The 2021 edition of Revenue Statistics in Africa shows that the use of environmental taxation remains limited in the region (OECD/AUC/ATAF, 2021):

- On average, revenues from environmental taxation amounted to 1.1% of GDP in 2019 across the 28 African countries considered, ranging from less than 0.1% of GDP in the Republic of the Congo and Nigeria to 4.7% in the Seychelles. This is comparable to the 16 economies from Asia-Pacific and the 27 Latin American and Caribbean economies, at 1.1% and 1.2%, respectively. It remains lower than the OECD unweighted average of 2.2% of GDP (Figure A1).
- Over two-thirds of environment tax revenues came from taxes on energy products, most commonly on diesel and gasoline. This represented the largest source of environmental taxation across 20 African countries. Revenues from motor vehicle and transport taxes accounted for most of the remainder. Other environmentally related bases, including pollution and resources, were negligible. This environmental taxation structure is also similar to OECD and Latin American and Caribbean economies. In contrast, most of the revenues generated in Asia-Pacific countries came from transport-related taxation.

[6] https://www.oecd-ilibrary.org/development/africa-s-development-dynamics_3290877b-en.
[7] https://www.oecd-ilibrary.org/taxation/revenue-statistics-in-africa-2021_c511aa1e-en-fr.

Figure A1. Environmentally related tax revenue by country and main tax base (% of GDP), 2019



Source: OECD/AUC/ATAF, 2021.
Note: These figures need to be treated with caution as it is not possible to identify the precise level of environmentally related tax revenue for each country; the level of revenues shown in this figure depends on the granularity of tax revenue data available. The tax bases covered include: (i) energy products; (ii) transport equipment and transport services; (iii) pollution, including measured or estimated emissions to air and water, ozone-depleting substances, certain non-point sources of water pollution, waste management and noise and (iv) natural resources, such as management of water, land, soil, forests, biodiversity, wildlife and fish stocks, including mining and quarrying.

Reforming fossil fuel subsidies and introducing carbon pricing can help reduce the growing risk of air pollution and finance a green transition. In 2020, energy subsidies in Africa reached $40 billion, of which about 60% were for households. Around half of energy spending was for oil products — transport fuels, cooking fuels and diesel for small generators and industrial use — with a large part taxed at lower rates or subsidised (IEA, 2022). According to the OECD (2021b), the revenue potential of reforming fossil fuel subsidies and introducing carbon rates on fossil fuels equivalent to €30 per tonne of CO_2[8] could generate additional revenues of about 1.2% of GDP on average, across seven African countries.[9] However, implementing energy tax and subsidy reforms needs careful design and sequencing to avoid unintended side effects, to tackle the political economy of such reforms — such as affordability concerns and biofuel-switching that could worsen air pollution outcomes — and to ensure that sustainable energy benefits from reallocated resources. As the effects of the crisis in Ukraine continue to affect energy prices, governments may pay attention to temporary and targeted tax relief for the most vulnerable to avoid compromising broader environmental objectives.

[8] The threshold of €30 per tonne of CO_2 is a low-end estimate of the climate damage caused by one tonne of CO_2 emitted at present. The level of carbon prices needed to meet the objectives of the Paris Agreement is generally considered to be higher than the low-end benchmark of €30. According to the High-Level Commission on Carbon Prices, carbon prices would need to be at least $40–80/t$CO_2$e by 2020 and $50–100/t$CO_2$e by 2030 in order for emissions to decrease in line with the goals of the Paris Agreement, assuming favourable complementary policies (OECD, 2019b).
[9] This study included the following African countries: Côte d'Ivoire, Egypt, Ghana, Kenya, Morocco, Nigeria and Uganda.

African governments and international partners could increase their efforts in achieving a just transition. Following the COVID-19 crisis, multiple African governments, such as Nigeria, Senegal and Ethiopia, introduced green policy objectives in their recovery plans, including fiscal support to invest in green infrastructure and energy (AUC/OECD, 2022). At the continental level, the African Union Commission launched the Green Recovery Action Plan 2021–2027 to reduce carbon emissions across all sectors and build resilience in local communities. Coordinated policies at the international level are also key to tackling the global burden of air pollution. OECD countries can strengthen their efforts to implement carbon pricing given their high reliance on fossil fuels and large contributions to global CO_2 emissions. Currently, about 72% of energy-related CO_2 emissions from OECD countries are priced below the €30 per tonne of CO_2 threshold (OECD, 2019b).

6

European Investment Bank investment in sub-Saharan Africa

This chapter is authored by Giulia Scammacca del Murgo of the European Investment Bank. Many thanks to Donal Cannon, Carmelo Cocuzza, Christophe Litt, Anne Schmidt-Sheehan, Markus Schulte, Jean-Philippe Stijns and Peter Zajc for their input on the chapter. Thanks also go to Colin Bermingham, Claudio Cali, Mihaljek Dubravko, Barbara Marchitto, Debora Revoltella and Ricardo Santos for their comments on an earlier draft.

Key messages

The European Investment Bank (EIB) partners with the African financial sector (private and public) both directly and indirectly through financial intermediaries. This enables the Bank to support productive investments in innovation and growth across many sectors, sustaining jobs — especially for women and young people — by providing affordable, long-term and, in some cases, risk-sharing finance to financial intermediaries. Each operation is designed to help partners realise their Sustainable Development Goal (SDG) targets and climate commitments while taking into account EU priorities such as climate action, digital transformation and gender equality.

In 2021, EIB credit lines enabled local and regional banks to provide an estimated 15 000 loans to African small and medium-sized enterprises and mid-caps (mid-tier firms with up to 3 000 employees). Its support for microfinance lending in Africa is expected to facilitate over 130 000 loans to micro-entrepreneurs — including 42 000 loans to women — and investee companies of private equity funds supported by the EIB are expected to create over 30 000 jobs.

With EIB Global, the European Investment Bank aims to make even more of a developmental impact through targeted operations, helping to grow ever-stronger bonds between Europe and Africa, enhancing economic ties and placing the European Union’s climate action and economic development at the heart of a shared agenda.

Financing in partnership

Beyond Europe, the European Investment Bank works with its long-standing partners from both the private and public sector on impactful, tailored financing operations to implement the European Union's policy priorities and progress towards the achievement of the Sustainable Development Goals (EIB, 2022a). The Bank has been active since 1963 in over 140 economies outside the European Union, including 41 of the 56 countries classified as fragile by the Organisation for Economic Co-operation and Development (OECD, 2020).

In particular, the European Investment Bank has been supporting infrastructure projects, innovative firms and renewable energy schemes, the public sector and private companies — ranging from microenterprises to the largest multinationals (Figure 1) — through investments in 52 African countries worth €59 billion since 1965 (EIB, 2021d). In 2021 alone, the Bank signed agreements for investments benefiting operations worth €2 billion in sub-Saharan Africa under the dedicated ACP Investment Facility as well as the Bank's own resources (EIB, 2022a).[1]

In November 2021, the European Investment Bank set up a fully dedicated branch — EIB Global — to further strengthen its engagement beyond Europe.[2] From 2022 onwards, EIB Global operations in Africa will be appraised, approved and disbursed under the new EU-ACP partnership agreement using the Neighbourhood, Development and International Cooperation Instrument (NDICI), otherwise known as Global Europe.[3] The EIB will continue its lending to the private sector through a dedicated trust fund, the successor of the ACP Investment Facility, to promote sustainable and inclusive economic growth by supporting higher risk projects that are expected to deliver greater benefits for development.

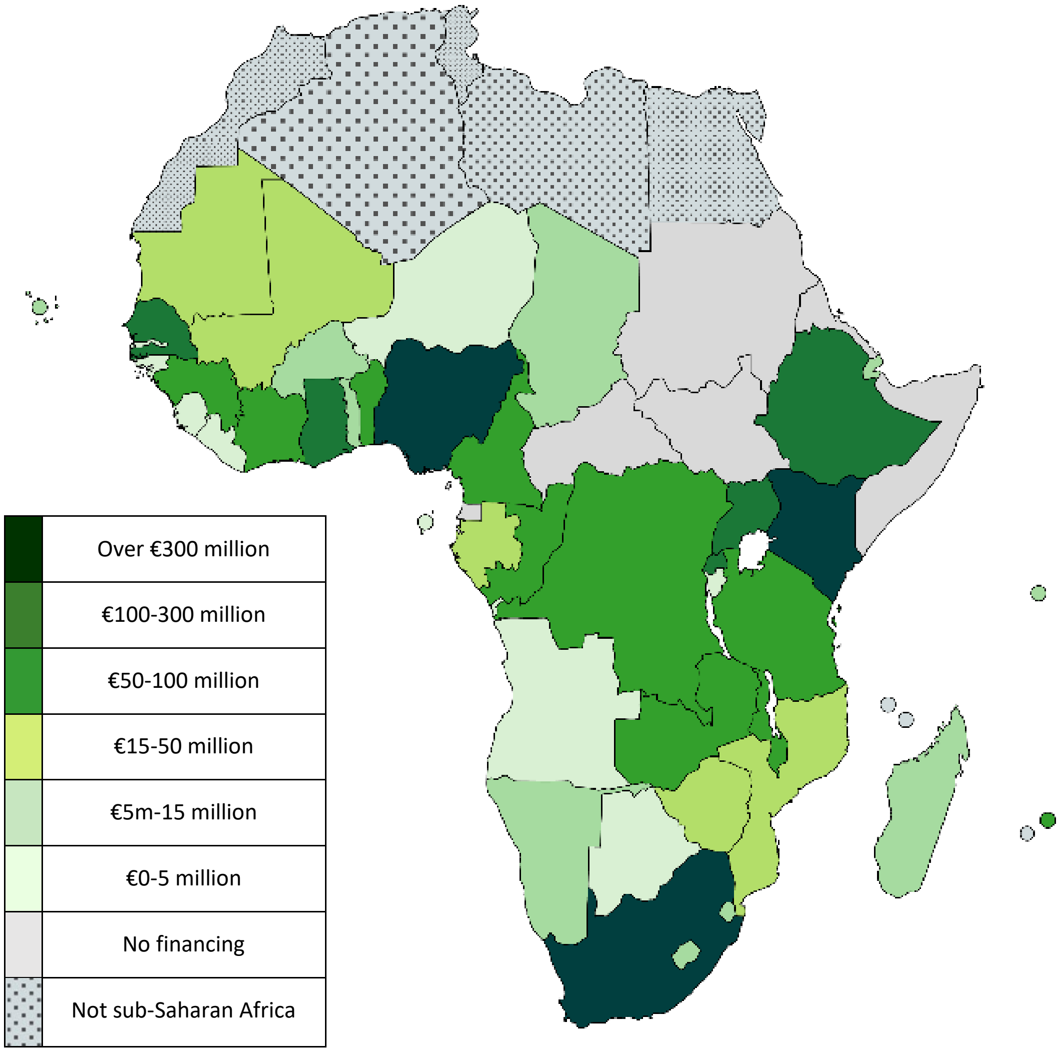
---

[1] Until 2021, the EIB financed operations in Africa under both the investment facility and its own resources under the External Lending Mandate (EIB, 2021a). The investment facility, a revolving fund established under the EU-ACP partnership agreement (or the Cotonou Agreement), is where revenue was reinvested in new financing operations for investment projects in the region using a broad range of flexible risk-bearing instruments, such local currency lending, investment grants and guarantees.

[2] EIB Global (https://www.eib.org/en/global/index.htm), the new branch of the European Investment Bank, is dedicated to development finance, climate action, innovative investments, sustainable living and new ways of helping people in locations where life is the hardest. EIB Global increases the impact of development finance and will mobilise billions each year from private investors. This branch proves that development lending and financial partnerships accelerate growth, make rural areas more prosperous, make cities more innovative and strengthen economies for a better future.

[3] The NDICI is a new financing instrument proposed by the European Commission that aims to combine funding for programmes in different fields of EU external action into one single instrument. The budgetary framework for the programmes in the field of development, international cooperation and neighbourhood policies is driven by this instrument's policy-driven and inclusive approach (European Parliament, 2021).

Figure 1. Actual, expected and projected beneficiary locations of EIB financial sector operations signed, 2017–2021



Source: Author's calculations and Maptool, available at mapchart.net.

The European Investment Bank draws on its long experience of operating in developing and emerging economies to assess the investment needs and barriers to investment in strategic areas such as climate change, access to finance, innovation and social inclusion, as well as social, environmental and enabling infrastructure. Specifically, the European Investment Bank uses public sector financing to help governments to alleviate transport bottlenecks and provide digital, power, water and sanitation services and stronger and more resilient health systems, together with access to financing solutions through African public development banks and other finance vehicles. Furthermore, targeted high-risk private sector and project finance operations enable corporates, banks and public-private partnership structures in various sectors to sustain the growth of their businesses, which also contributes to creating more jobs and ultimately reducing poverty.

The European Investment Bank has carried out an annual survey of African banks since 2016. This survey has been the basis for an annual publication on banking and financial sectors across the continent: the EIB Finance in Africa report (or its predecessor, EIB Banking in Africa, from 2016 to 2020). Working with the World Bank and the European Bank for Reconstruction and Development, the EIB has launched enterprise surveys across a number of countries in North Africa to collect data that inform evidence-based research and to identify the real-life constraints and opportunities for sustainable development in the targeted economies (EIB, 2022d). Together

with United Kingdom Department for International Development, the European Bank for Reconstruction and Development, the International Finance Corporation, the Swedish Government Agency for Development Cooperation and the World Bank, the EIB has established a Country Diagnostic Working Group to share perspectives and experiences in this field and to promote further institutional collaboration.[4]

The European Investment Bank delivers all its investments through partnerships. Partnering with others and crowding-in other sources of financing is institutionally mandated and a key part of the Bank's identity. Typically, the European Investment Bank finances around one-third of the costs of a project but can provide up to a maximum of 50% of project costs in most cases.

African governments, the European Commission and the European External Action Service are the key long-term partners for all of the European Investment Bank's operations in Africa. The Bank supports the European Union's ambitions to remain a frontrunner in implementing the 2030 Agenda and supporting Africa's Agenda 2063. Other partners include European bilateral development finance institutions, other multilateral and regional development banks, UN agencies, the African Union and philanthropic foundations. By working with partners, the European Investment Bank aims to maximise the positive impact of its financing to make a genuine difference for people across the continent. The European Investment Bank, as part of Team Europe,[5] has stepped up its financing to record levels to improve the development impact and financial sustainability (Figure 2) of its engagements across Africa. In all of its financing operations, be they direct or indirect, the Bank applies the relevant EU policies regarding procurement, compliance, environmental and social standards and management.

Under various mandates[6], the European Investment Bank has worked with African countries to promote economic growth, integrating their economies into global value chains, seizing the opportunities offered by digital technologies to leapfrog communication constraints, developing renewable energy markets, infrastructure and skills at the grid level for some of the most remote communities, and addressing global challenges such as the coronavirus pandemic.

The European Investment Bank has a well-established project appraisal and impact framework in place to track and assess both the financial viability and the expected outcomes of individual projects using a formalised set of indicators, many of which have been harmonised with multilateral institutions and donors. In just one of its impact-focused programmes, SheInvest, the European Investment Bank committed in 2021 to double its ambitions and mobilise €2 billion of gender-responsive investment across the continent.[7] Similarly, the increased focus on operations promoting digitalisation in Africa also creates business opportunities for young people, women and rural populations by connecting them to essential services, financing and customers.

[4] https://www.countrydiagnostics.com/.
[5] Team Europe is a package launched by the European Union to support partner countries in the fight against the coronavirus pandemic and its consequences. The objective of the Team Europe approach is to combine resources from the European Union, its Member States and financial institutions, particularly the European Investment Bank and the European Bank for Reconstruction and Development. See https://www.eeas.europa.eu/eeas/coronavirus-eu-action-vaccines-team-europe-support-disinformation-repatriation-and-solidarity_en.
[6] The Lomé Convention is a trade and aid agreement between the European Economic Community (EEC) and 71 African, Caribbean and Pacific (ACP) countries, first signed in February 1975 in Lomé, Togo. The Convention was the predecessor of the Cotonou Agreement, which was first signed in June 2000 in Cotonou, Benin, by 78 ACP countries. Under the External Lending Mandate, the EIB delivered financing in the pre-accession countries, the Southern Neighbourhood and Mediterranean region, as well as Latin America and Asia.
[7] https://www.eib.org/en/press/all/2021-162-sheinvest-eib-doubles-its-commitment-to-mobilise-eur2-billion-for-women-across-africa.htm.

Figure 2. Expected results of new projects in 2021

5 GENDER EQUALITY	42 000 microfinance loans to women	8 DECENT WORK AND ECONOMIC GROWTH	375 000 jobs sustained in supported SMEs, microenterprises and mid-cap companies
6 CLEAN WATER AND SANITATION	455 000 people benefiting from safe drinking water	7 AFFORDABLE AND CLEAN ENERGY	374 GWh/year electricity produced from renewable energy sources
13 CLIMATE ACTION	3.2 million people benefiting from improved waste collections	3 GOOD HEALTH AND WELL-BEING	420 million people vaccinated against COVID-19, 280 million children vaccinated against other diseases

Assessing the impact of European Investment Bank projects

Box 1. Three approaches to measuring the impact and contribution to sustainable development

The European Investment Bank uses three complementary approaches to measure its financing operations' impact and contribution to sustainable development.

The European Investment Bank's **Additionality and Impact Measurement framework** tracks the long-term outcomes of investments and their alignment with the strategic goals of the European Union and the Bank in targeted countries. **Macroeconomic modelling** is used to investigate the broader economic impact of the Bank's lending. The European Investment Bank also invests in in-depth **impact studies** to understand the impact of its operations on the ground (EIB, 2021b).

For example, under a pilot programme in partnership with the Global Development Network, a set of researchers from Africa and the Caribbean carried out impact studies on a range of private sector impact investment projects (EIB, 2021c). The studies were carried out with the appropriate rigour and using up-to-date methods under the supervision of renowned expert advisors that provided technical advice to the programme and to fellow researchers. This approach helped to build and support the local research capacity of communities in Africa and the Caribbean.

With some 30 researchers from Ethiopia, Rwanda, Senegal, Mali, Cameroon, Ghana, Nigeria, Kenya and The Gambia, the programme produced 16 impact studies, including a study on the effect of the provision of free internet in Kenyan schools, another on the impact of maternal and child health services from a small private health company in Senegal, and another on the effect of microfinance on women's economic empowerment, economic well-being, farming and asset accumulation.

To help address the impacts of climate change in Africa, the European Investment Bank financed several climate mitigation and adaptation projects in 2021, including renewable energy projects that will produce 374 GWh/year of electricity and improved water supply investments that will benefit more than 450 000 people. Under its 2021–2025 Climate Bank Roadmap, the European Investment Bank has pledged to increase the share of financing dedicated to climate action and environmental sustainability to half of its annual overall lending. The Bank's lending is fully consistent with the principles and goals of the Paris Agreement and abides by key initiatives targeting the financial sector, such as the EU Taxonomy for Sustainable Investment and new regulations on non-financial disclosures.

The coronavirus pandemic prompted the European Investment Bank to increase its support for projects related to health and economic resilience, including vital economic and social infrastructure. Through its financing, the EIB plays an important role in biotech research and deploying vaccines, in conjunction with the European Commission and the COVAX facility, in 92 middle and low-income countries. Projects signed in 2021 are expected to unlock much-needed vaccines for over half a billion people beyond Europe, with the aim of

benefiting individuals that are excluded, vulnerable or disadvantaged, particularly women and young people, who have been disproportionately affected by the crisis.[8]

Promoting access to finance across Africa

Private enterprises across Africa often struggle to access finance for productive investment, particularly loans with long tenors or for risk-bearing, equity-style investment. It is typically smaller, younger firms and innovative companies that are the most affected by such gaps in domestic financial markets. The European Investment Bank reaches out to African private sector firms both directly and indirectly through financial intermediaries. This enables the Bank to support productive investments in innovation and growth across many sectors, sustaining jobs — especially for women and young people — by providing affordable, long-term and, in some cases, risk-sharing finance to financial intermediaries (Figure 3). These facilities, designed to support micro, small and medium-sized enterprises (MSMEs), are mostly channelled through private sector-owned banks, impact funds or microfinance institutions (Figure 4).

Figure 3. 2021 financial sector operations by region

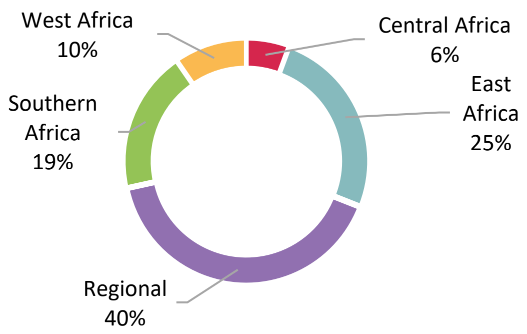
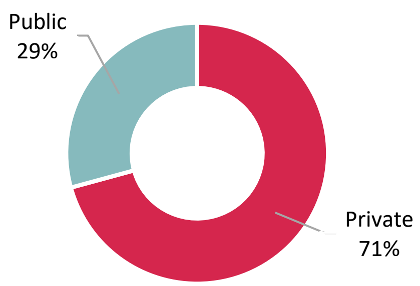


Figure 4. 2021 financial sector operations by ownership



Source: Author's calculations.

The European Investment Bank also partners with African public development banks, leveraging their capacity and local knowledge to jointly contribute to the achievement of EU priorities. For instance, the Bank partnered with the Trade and Development Bank, the financial arm of the Common Market for Eastern and Southern Africa, in providing much-needed long-term finance to strengthen the resilience of the economies of various fragile countries via investment loans to micro firms, small and medium-sized enterprises and mid-caps,[9] of which at least 25% are for climate action investment projects.

The European Investment Bank tailors its funding and technical assistance programmes for its financial sector partners to meet their long-term sustainability requirements, to crowd in finance from other stakeholders and to maximise development impact. Each operation is designed to help partner countries realise their SDG targets and climate commitments while taking into account EU priorities such as climate action, digital transformation and gender equality.

The European Investment Bank uses a wide range of funding products, including direct loans, equity investments and intermediated lending via banks and microfinance institutions as well as investments in private equity and venture capital funds. The Bank also uses innovative risk-sharing products to catalyse private sector finance. For example, a significant portion of the Bank's lending, particularly in sub-Saharan Africa, is also carried out in local currency, mitigating the borrower's risk of unexpected foreign exchange movements.

[8] EIB own calculations (May 2022).

[9] In accordance with the European Commission's recommendation, the European Investment Bank defines small and medium-sized enterprises (SMEs) as companies with up to 250 employees and mid-caps as firms with between 250 and 3 000 employees (EIB, 2021f).

The European Investment Bank's financial sector operations are expected to support significant development results. For instance, the credit lines provided in 2021 will enable local and regional banks to provide an estimated 15 000 loans to African SMEs and mid-caps. Under the terms of these credit lines, the SME and mid-cap beneficiaries of EIB-supported loans are expected to support around 375 000 jobs (Figure 2). The European Investment Bank's lending to microfinance institutions enables it to also reach the very smallest firms, often individual entrepreneurs, or borrower groups who work together to borrow and repay loans for a common goal. The EIB's lending for microfinance in 2021 in Africa is itself expected to enable over 130 000 loans to micro-entrepreneurs, including 42 000 loans to women.

Investments in private equity and venture capital funds enable the European Investment Bank to support early-stage companies, or those moving into innovative industries or new markets, which are generally perceived as high risk but are nevertheless a very significant source of innovation and economic growth. The investee companies of private equity funds supported by the EIB in 2021 are expected to create over 30 000 jobs.

Examples of support for the private sector

Lending to African small and medium firms and mid-caps

Zambia: Agriculture Value Chain Risk-Sharing Facility

This €45 million lending operation helps the agrifood sector in Zambia to address market failures in agriculture value chains by increasing access to finance and strengthening the capacity of financial intermediaries to appraise and monitor investments in a relatively high-risk sector. By focusing on small companies engaged in agriculture and aquaculture (such as smallholders and fish farmers), the financing increases participation in environmentally sustainable, climate-resilient, market-integrated, nutrition- and gender-sensitive value chains. This operation was designed to deploy a European Commission grant for a risk-sharing facility that enables financial intermediaries to recover a proportion of losses they incur in their new investment in agriculture value chains.

1 NO POVERTY | 2 ZERO HUNGER | 8 DECENT WORK AND ECONOMIC GROWTH | 12 RESPONSIBLE CONSUMPTION AND PRODUCTION

Zimbabwe: Private Sector Facility

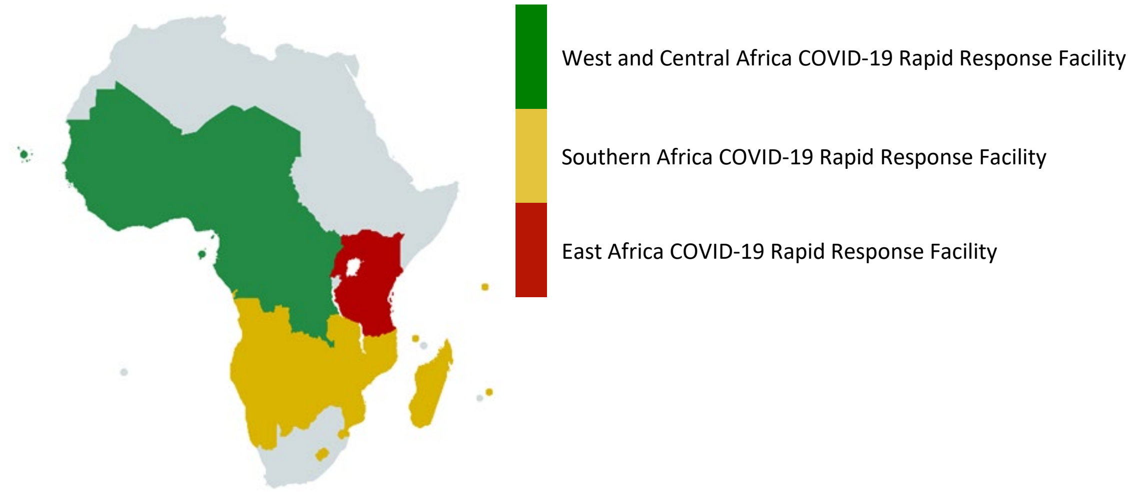
The €40 million Zimbabwe Private Sector Facility is an umbrella facility supporting much-needed private sector investment in Zimbabwe, focusing on businesses that have been hit hard by ongoing national economic crises. The operation is fully consistent with the European Union's re-engagement with Zimbabwe and the wider efforts of the international community. It supports Zimbabwe's private sector, which has been on hold for more than 20 years since the country defaulted on its external debt.

1 NO POVERTY | 2 ZERO HUNGER | 8 DECENT WORK AND ECONOMIC GROWTH | 9 INDUSTRY, INNOVATION AND INFRASTRUCTURE

Regional: COVID-19 rapid response facilities

Three regional umbrella credit facilities in East Africa (€175 million), South Africa (€200 million), and West and Central Africa (€200 million) were approved by the European Investment Bank's board in 2021 and deployed to various financial intermediaries (local banks, banking groups and development finance institutions) to support on-lending to private sector projects. The Trade and Development Bank Facility led to three credit line operations specifically focusing on fragile countries. Using the umbrella facilities, the European Investment Bank was well placed to relieve the liquidity and funding constraints that local banks and businesses would have suffered throughout the pandemic, thus reducing the economic and social impact of the COVID-19 crisis. Local currency financing and longer loan maturities have been incorporated into these umbrella facilities.

Figure 5. COVID-19 rapid response facilities



Ecobank COVID-19 Guarantee Facility

Ecobank Transnational Incorporated (ETI), a leading pan-African banking group, and the European Investment Bank have signed an agreement for a €100 million long-term credit facility over nine years to provide targeted support to small and medium firms in a number of sub-Saharan countries, with dedicated support for the business segments most impacted by the coronavirus pandemic. This operation is the first of its kind for the EIB in sub-Saharan Africa. The facility provides a partial portfolio guarantee to selected subsidiaries of ETI, enabling them to offer improved loan conditions and provide access to formal credit for underserved sectors or segments of the market that they have historically been unable or unwilling to reach.

Lending to microfinance institutions

The European Investment Bank provided €32 million worth of financing to African microfinance institutions in 2021. This resulted in over 130 000 loans to micro-entrepreneurs with an average loan size of €1 300, sustaining an estimated 42 000 jobs, the majority of which were for women and young people (76%).

ACP Microfinance Facility

In its first microfinance operation in the Democratic Republic of Congo, in December 2021 the European Investment Bank signed a €6 million loan under the ACP Microfinance Facility to the Fonds de Promotion pour l'Inclusion Financière (FPM SA). FPM SA supports the development of an inclusive and responsible financial system serving micro, small and medium-sized enterprises and low-income working populations by providing short- and long-term loans to local financial institutions (small banks and microfinance institutions), which in turn on-lend to the final beneficiaries.

Private equity and venture capital in Africa

The European Investment Bank's investments in private equity and venture capital funds are designed for, among others, early-stage companies and those moving into innovative industries or new markets that are generally perceived as high risk because of the limited track records of their products, services or profitability but hold some promise of a breakthrough in the near to medium term. The 248 investee companies across Africa supported by the EIB in 2021 under private equity funds were valued at over €3.2 billion. An average of €11 million was provided to each of the investees, creating an estimated 30 000 jobs.

AfricInvest PE Africa

In July 2021, the European Investment Bank committed $50 million to AfricInvest Fund IV,[10] a $400 million target fund focusing on growth capital investments in African small and medium enterprises. The EIB was one of the first investors in the first fund launched by AfricInvest, which was at that time a first-time team launching a venture capital fund focused on Tunisia in the early 1990s. Since then, the EIB has invested over €100 million in more than ten funds launched by the same fund manager. With the Bank's support, the fund manager has gradually expanded its coverage to become a pan-African private equity firm with local offices and dedicated local investment teams in Algeria, Morocco, Egypt, Nigeria, Kenya and Côte d'Ivoire. It is currently one of the most established African private equity firms, with approximately $1.9 billion in assets under management.



European Investment Bank advisory services

The European Investment Bank also supports the development of the financial sector by providing technical assistance to accompany its finance facilities, helping to improve access to finance and thereby expand financial inclusion. Technical assistance strengthens both the firms receiving funding and the local and regional financial sectors. Packaging advisory services with loans or equity finance helps build capacity and develop the skills of local partner banks and other finance providers, helping them better address the financing and sustainability needs of small businesses or microenterprises (Figure 6).

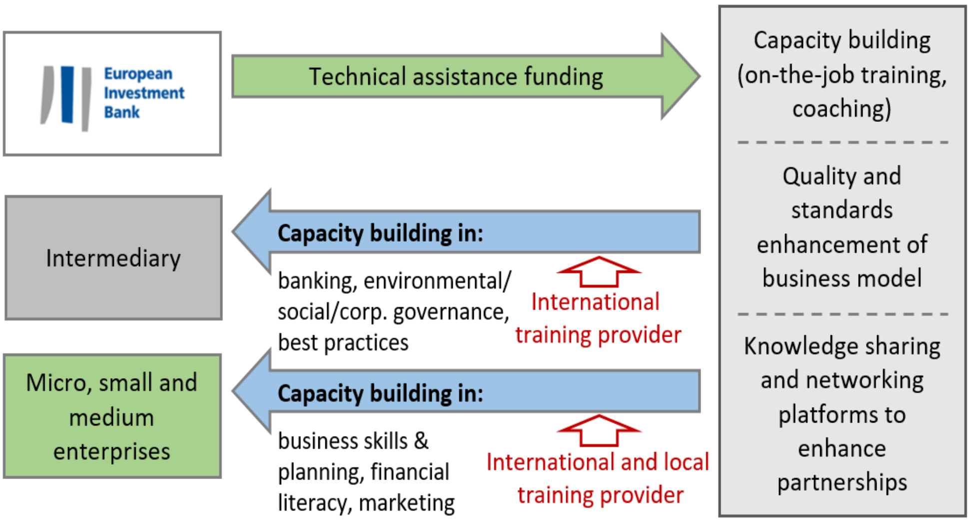
Advisory services help financial intermediaries improve their internal systems and working practices, develop and reach new segments or sectors and improve their capacity to address the fundamental challenges faced by the sector, such as climate change and environmental and social sustainability, as well as the management of core sectoral risks like capital adequacy, compliance and technology risk. Such technical assistance is typically provided by local training providers, including universities and banking institutes, based on train-the-trainers programmes that have been developed under the technical assistance initiatives. The intention is to ensure the longer-term sustainability of training and capacity-building services so that they can be delivered well beyond the lifetime of the Bank's initial assistance.

One such example is the e-learning course developed by the European Investment Bank and the International Monetary Fund (IMF)[11] combining IMF expertise in macroeconomic and financial sector policies with the EIB's focus on best banking practices and instruments. Participants primarily work for commercial banks, but also microfinance, central banks and development finance institutions. Delivered in both English and French, the course enables participants to gain deeper knowledge on financial access and financial inclusion topics, financial products and services designed to meet the needs of private sector enterprises and small and medium firms, and standard risk management methodologies for SME lending. Since its launch in 2019, more than 4 000 participants from 70 countries and five continents have enrolled, 20% of whom were women.

[10] https://www.africinvest.com/.

[11] https://www.eib.org/en/publications-research/open-learning/financial-development-inclusion.htm. The course was developed following the 2018 signature of a memorandum of understanding of the EIB with the IMF to support financial sector development, particularly in Africa.

Figure 6. Delivery model of the EIB's financial sector technical assistance for intermediated lending



Source: EIB Banking in Africa survey, 2022.

In 2021, the European Investment Bank offered a series of regional SME banking and microfinance academies for high-level representatives of financial intermediaries, focusing on banking reform in areas such as capital adequacy, anti-money laundering measures and cybersecurity, climate finance, gender-based finance and the digitalisation of financial services. The West and Central Africa Banking Academy was held Abidjan on 5 and 6 October and hosted over 600 participants from more than 60 countries.[12] It followed academies held in Nairobi and Pretoria, which not only provided capacity building for local financial intermediaries but also supported relationship building and business origination.

Throughout 2021, the European Investment Bank financed and implemented 11 technical assistance operations that had been designed for the benefit of sub-Saharan African financial intermediaries, primarily as dedicated regional programmes in Southern Africa, East Africa and more recently in West and Central Africa.

Green Gateway — Greening Financial Systems Technical Assistance Programme

Greening Financial Systems (GFS) is a €20 million technical assistance programme financed by the International Climate Initiative Fund and Nationally Determined Contributions Partnership for implementation in a number of technical assistance operations focused on one or more countries. The overall objective of the GFS programme is to promote net-zero and climate-resilient financial systems that will ultimately support the private sector in deploying climate-related and environmentally sustainable investments. One component of the programme is aimed at central banks and financial sector supervisors, while a second component is intended for financial intermediaries.

Digital transformation of the financial sector

The Digital Transformation of the Financial Sector (DTFS) programme was developed under the Africa Digital Transformation Initiative Framework to support project preparation and related activities in the sub-Saharan African digital economy. It is intended to strengthen the capacity and competitiveness of the banking sector, with a focus on the private sector and micro, small and medium-sized company finance. The programme is designed to support research, development and innovation, implementation and training of IT systems for mobile banking, digitalisation in general, process optimisation, business model evolution, regulatory requirements, risk management and cyber security.

[12] https://www.eib.org/en/press/all/2021-324-hundreds-of-african-financial-professionals-benefit-from-eib-banking-and-microfinance-academy.

Financial Inclusion Fund

The €1.1 million Financial Inclusion Fund (FIF) (EIB, 2022c) was established in 2019 to provide grants for capacity building in partner multilateral financial institutions and relevant stakeholders across the sub-Saharan Africa, Caribbean and Pacific (ACP) region and ultimately to improve access to finance for micro, small and medium-sized businesses. Projects that are designed to improve (i) the financial and/or social performance of microfinance institutions or (ii) the financial literacy and entrepreneurship skills of the companies themselves are eligible for the grants. Thanks to contributions from Luxembourg's ministries of Finance and Foreign and European Affairs, the FIF had co-funded 18 projects by 31 December 2021, amounting to €2.2 million in funding used in more than 20 ACP countries. These projects are expected to provide some 4 000 hours of training to almost 30 000 people and coaching to more than 3 000 people. The broader outcomes are expected to include improved access to financial services for almost 600 000 people in remote and rural parts of Zambia, the rollout of digital banking to 26 400 people in Uganda and finance for some 200 000 female micro-entrepreneurs in Uganda.

West and Central Africa Technical Assistance Programme

The €2.86 million West and Central Africa (WCA) Technical Assistance Programme targets financial institutions and micro, small and medium-sized companies in more than 25 countries across West and Central Africa (IPC, 2021).[13] The programme was designed to strengthen the financial sector, broaden financial inclusion, reduce poverty, improve social stability and encourage entrepreneurship across regions in alignment with the Sustainable Development Goals. The programme provides project preparation for possible access to European Investment Bank credit lines, capacity building in risk management, governance, regional strategy, outreach and skills development through formal training programmes and regional banking academies.



Finance and technical assistance operations in support of women's access to finance

Gender loans targeting women

The European Investment Bank's East Africa SME Regional Facility of €150 million was designed for East African financial intermediaries to on-lend to SMEs. Among the four credit lines that have already been signed under the facility, two — Uganda Development Bank and Development Finance Company of Uganda (DFCU) — have a particular focus on female financial inclusion since, to meet the 2X Challenge criteria,[14] at least 30% of the credit lines have to have women as end beneficiaries. The overall facility is also expected to contribute towards the Sustainable Development Goals, in particular to SDG 8 (Decent work and economic growth).

[13] Technical assistance website: https://msmefinanceta.eu/.

[14] The 2X Challenge was founded by the development finance institutions from the G7 as a call to action to shift more capital towards investments that empower women in developing countries to access entrepreneurship and leadership opportunities, quality jobs and products and services that enhance their economic participation. See https://www.eib.org/en/press/all/2021-193-global-gender-finance-initiative-sets-ambitious-new-usd15-billion-fundraising-goal-after-securing-more-than-double-its-original-usd3-billion-target.

Women Entrepreneurship Development Project in Ethiopia

In 2021, the European Investment Bank launched the Women Entrepreneurship Development Project (WEDP), a €1.2 million technical assistance programme supporting a €30 million loan to the Federal Republic of Ethiopia and the Development Bank of Ethiopia for female entrepreneurs in micro, small and medium-sized enterprises. WEDP is co-financed by the World Bank, the Japanese International Cooperation Agency and Cassa Depositi e Prestiti. The two-and-a-half-year programme is designed to promote responsible financial inclusion and access to medium- and long-term financial services for women-owned MSMEs in Ethiopia, to reduce poverty and encourage entrepreneurship in the country. WEDP provides capacity building in dedicated training and coaching programmes offered to 14 partner microfinance institutions to help them improve their financial and non-financial services for women-owned and partially owned MSMEs and to efficiently deploy WEDP funds. Key activities also include helping microfinance institutions to switch to cash flow-based lending, improving risk management practices and managing social performance. In addition to the provision of tailor-made capacity-building services, the programme seeks to build a sustainable, local source of technical support and advice for microfinance institutions that will run beyond the duration of the technical assistance operation.

African Women Rising Initiative

The African Women Rising Initiative (AWRI) was designed to economically empower women by providing financial literacy training and business development services to women entrepreneurs in Rwanda, Senegal, Côte d'Ivoire and Uganda while at the same time improving the supply of financial and non-financial services meeting their needs. On the one hand, AWRI focuses on the capacity-building, mentoring and networking activities of women entrepreneurs, and on the other, it supports European Investment Bank intermediaries in the banking and microfinance sectors in designing, establishing and actively promoting financial services tailored to the specific needs of women entrepreneurs. AWRI is already engaging with the Bank of Kigali, the Development Bank of Rwanda, Ecobank, Baobab, Pride and Centenary in the microfinance sector.

The way forward

With the establishment of EIB Global, the European Investment Bank aims to strengthen its cooperation with partners, beneficiaries, development finance institutions and civil society to improve the way development financing is delivered. The EIB Global — Partnerships Worldwide report (EIB, 2022b) sets out the key strategic and policy ideas at play and the vision that this new organisation pursues. EIB Global is currently working to strengthen it local presence in some 30 offices outside the European Union, putting bankers and engineers at the disposal of its partner countries, the European Union's global and partnership policies and, of course, Team Europe. The creation of regional hubs will enable EIB Global to better support project identification, preparation and implementation, and accelerate the disbursement of finance and investment.

EIB Global is committed to delivering even more development impact through its targeted operations, helping grow the ever-stronger bonds between Europe and Africa, enhancing economic and trade ties between the two continents and placing the European Union's climate action and development finance at the heart of their shared agenda.

References

EIB (2021a). "EIB support for development — Overview 2021." Available at: https://www.eib.org/attachments/thematic/eib_support_for_development_overview_2021_en.pdf.

EIB (2021b). "Measuring the EIB Group's impacts — Methods and studies." Available at: https://www.eib.org/en/publications/measuring-the-eib-groups-impact-methods-and-studies.

EIB (2021c). "Measuring impacts — The experience of the EIB-GDN Programme." Available at: https://www.eib.org/en/publications/measuring-impacts-the-experience-of-the-eib-gdn-programme.

EIB (2021d). "A partnership with Africa." Available at: https://www.eib.org/en/projects/regions/acp/partnership-with-africa/index.htm.

EIB (2021e). "The rise of Africa's digital economy — The European Investment Bank's activities to support Africa's transition to a digital economy." Available at: https://www.eib.org/attachments/thematic/study_the_rise_of_africa_s_digital_economy_en.pdf.

EIB (2021f). "Small and medium enterprises — Overview 2021." Available at: https://www.eib.org/attachments/publications/small_and_medium_enterprises_overview_2021_en.pdf.

EIB (2022a). "EIB global report: the impact." Available at: https://www.eib.org/en/publications/eib-global-report-the-impact.

EIB (2022b). "EIB global — Partnerships worldwide." Available at: https://www.eib.org/attachments/publications/eib_global_flyer_en.pdf.

EIB (2022c). "Financial inclusion fund." Available at: https://www.eib.org/attachments/publications/financial_inclusion_fund_en.pdf.

EIB (2022d). "Unlocking sustainable private sector growth in the Middle East and North Africa." Available at: https://www.eib.org/en/publications-research/economics/surveys-data/unlocking-sustainable-private-sector-growth-in-mena.htm.

European Parliament (2021). "A new neighbourhood, development and international cooperation instrument — Global Europe." Briefing of the European Parliamentary Research Service. Available at: https://www.europarl.europa.eu/thinktank/en/document/EPRS_BRI(2018)628251.

IPC (2021). "EIB technical assistance programme for financial sector operations in West & Central Africa." Available at: https://www.msmefinanceta.eu/wp-content/uploads/2021/08/EIB-TA-for-FS-Operations-in-West-and-Central-Africa-TA-AA-000959-001-brochure_english.pdf.

OECD (2020). "States of fragility 2020." Available at: http://www.oecd.org/dac/states-of-fragility-fa5a6770-en.htm.

European
Investment
Bank
The EU bank

European Investment Bank
98-100, boulevard Konrad Adenauer
L-2950 Luxembourg
+352 4379-1
www.eib.org – info@eib.org

twitter.com/EIB
facebook.com/EuropeanInvestmentBank
youtube.com/EIBtheEUbank

eBook: ISBN 978-92-861-5381-5
pdf: ISBN 978-92-861-5382-2

10/2022 – EN